INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

Mitchell E. Daniels Jr.
Governor

Thomas W. Easterly
Commissioner

100 North Senate Avenue
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Toll Free (800) 451-6027
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Mr. David Boggs
SABIC Innovative Plastics Mt. Vernon, LLC
1 Lexan Lane
Mount Vernon, Indiana 47620-9367

RE: 129-26650-00002
First Significant Permit Modification to
Part 70 Operating Permit Renewal No.: T129-6794-00002

Dear Mr. Boggs:

SABIC Innovative Plastics Mt. Vernon, LLC was issued a Part 70 Operating Permit T129-6794-00002, for a stationary plastics manufacturing plant. An application requesting changes to this permit was received on May 29, 2008. Pursuant to the provisions of 326 IAC 2-7-12, a significant permit modification to this permit is hereby approved as described in the attached Technical Support Document.

The modification application, submitted by SABIC Innovative Plastics Mt. Vernon, LLC relates to the removal of coating Line 16 from the source. SABIC Innovative Plastics Mt. Vernon, LLC also applied to allow the use of a temporary natural gas/ fuel oil-fired boiler, rated at a maximum 10.468 MMBtu/hr, and two temporary emergency generators, each rated at 2,332 Hp each. In addition, the source requested a permit modification to incorporate the requirements of 40 CFR Part 63, Subpart PPPP into the existing Part 70 Operating permit. Finally, the source requested minor changes in existing recordkeeping and equipment descriptive information.

The changes in the Part 70 Operating Permit are documented in the Technical Support Document. All other conditions of the permit shall remain unchanged and in effect. For your convenience, the entire revised Title V Operating Permit, with all modifications and amendments made to it, is being provided.

This decision is subject to the Indiana Administrative Orders and Procedures Act - IC 4-21.5-3-5. If you have any questions on this matter, please contact David Matousek, IDEM, Permits Branch, OAQ, 100 North Senate Avenue, MC61-53 IGCN 1003, Indianapolis, Indiana 46204-2251, or call at (800) 451-6027 and ask for David Matousek or extension 2-8253, or dial direct (317) 232-8253.

Sincerely,

Tripurari P. Sinha, Ph.D., Section Chief
Permits Branch
Office of Air Quality

Attachments
DJM/djm

CC: File - Posey County
U.S. EPA, Region V
Posey County Health Department
Air Compliance Section Inspector
Compliance Branch
Administrative and Development Section

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PART 70 OPERATING PERMIT
OFFICE OF AIR QUALITY

SABIC Innovative Plastics Mt. Vernon, LLC
1 Lexan Lane
Mt. Vernon, Indiana 47620-9367

(herein known as the Permittee) is hereby authorized to operate subject to the conditions contained herein, the source described in Section A (Source Summary) of this permit.

The Permittee must comply with all conditions of this permit. Noncompliance with any provisions of this permit is grounds for enforcement action; permit termination, revocation and reissuance, or modification; or denial of a permit renewal application. Noncompliance with any provision of this permit, except any provision specifically designated as not federally enforceable, constitutes a violation of the Clean Air Act. It shall not be a defense for the Permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. An emergency does constitute an affirmative defense in an enforcement action provided the Permittee complies with the applicable requirements set forth in Section B, Emergency Provisions.

This permit is issued in accordance with 326 IAC 2 and 40 CFR Part 70 Appendix A and contains the conditions and provisions specified in 326 IAC 2-7 as required by 42 U.S.C. 7401, et. seq. (Clean Air Act as amended by the 1990 Clean Air Act Amendments), 40 CFR Part 70.6, IC 13-15 and IC 13-17.

Operation Permit No.: T129-6794-00002	
Issued by: Original signed by Nisha Sizemore, Chief Permits Branch Office of Air Quality	Effective Date: January 1, 2007 Expiration Date: January 1, 2012

First Administrative Amendment No. 129-25275-00002, issued November 21, 2007; and
Second Administrative Amendment No. 129-25737-00002, issued on February 5, 2008.

First Significant Permit Modification No. 129-26650-00002	
Issued by: Tripurari P. Sinha, Ph.D., Section Chief Permits Branch Office of Air Quality	Effective Date: Expiration Date: January 1, 2012

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SECTION A SOURCE SUMMARY

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 through A.21 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this permit pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)] [326 IAC 2-7-1(22)]

The Permittee owns and operates a stationary plastics manufacturing plant.

Source Address:	1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address:	1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
General Source Phone Number:	(812) 831-7000
SIC Code:	2821
County Location:	Posey
Source Location Status:	Attainment or unclassifiable for all criteria pollutants
Source Status:	Part 70 Permit Program Major Source, under PSD Rules Major Source, Section 112 of the Clean Air Act In 1 of 28 Source Categories

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-7-4(c)(3)] [326 IAC 2-7-5(15)]

This stationary source consists of the following emission units and pollution control devices set forth in A.3 through A.21:

A.3 Boilerhouse II [Section D]

A.3.1 Boilerhouse II, Building 2

<u>Boilerhouse II Affected Facilities/Sources</u>

(a) The affected facilities subject to 40 CFR 60, Subpart Db are identified as NE BOILER, BW GAS, and H BOILER. The affected facility is a device which combusts any fuel or byproduct/waste to produce steam or to heat water or any other heat transfer medium, commences construction, modification, or reconstruction after June 19, 1984, and has a heat input capacity of greater than 100 million Btu per hour.

(b) [Reserved]

<u>Natural Gas fired boilers</u>

(c) The three (3) natural gas fired boilers that are located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
01-101	NE BOILER	NEBRASKA BOILER natural gas fired, low NOx burners and flue gas recirculation	None	None	250 MMBtu/hr	1989
01-014	BW GAS	B&W #3 GAS BOILER natural gas fired, low NOx burners and flue gas recirculation	None	None	250 MMBtu/hr	1996
01-100	H BOILER	HOLMAN BOILER VENT natural gas fired, low NOx burners and flue gas recirculation	None	None	200 MMBtu/hr	1996

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

Coal/Natural Gas fired boilers

(d) The two (2) coal and natural gas fired boilers that are located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
01-001	BW1-BOILER	B&W #1 BOILER Coal fired (natural gas is used for igniter)	Fabric Filter	None	249 MMBtu/hr	1979
01-001	BW2-BOILER	B&W #2 BOILER Coal fired (natural gas is used for igniter)	Fabric Filter	None	249 MMBtu/hr	1979

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

Ash Handling

(e) The ash handling equipment located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-006	BF-ASVB	BAG FILTER FOR ASH HANDLING SYSTEM	None	Bagfilter	11.3 tons/hr	1979

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-005	TRDB	TRIPPER ROOM DUST BLOWER	None	None	30 tons/hr	N/A
01-007	ASVBF	ASH SILO BAG FILTER	Bagfilter*	None	11.3 tons/hr	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))
* There are no control requirements for the bagfilter associated with stack/vent ID 01-007 because uncontrolled emissions/hour are only about 10 percent of the allowable emissions for this emission unit.

A.4 Phenol [Section E]

A.4.1 Phenol, Buildings 40 and 42

Phenol Affected Facilities/Sources

(a) The Phenol Chemical Manufacturing Process Unit (PhCMPU) subject to 40 CFR 63, Subpart F, G, and H is identified by its primary product, which is Phenol. The PhCMPU consists of equipment assembled and connected by pipes or ducts to process raw materials and to manufacture Phenol. A chemical manufacturing process unit consists of more than one unit operation. The PhCMPU includes air oxidation reactors and their associated product separators and recovery devices; reactors and their associated product separators and recovery devices; distillation units and their associated distillate receivers and recovery devices; associated unit operations; associated recovery devices; and any feed, intermediate and product storage vessels, product transfer racks, and connected ducts and piping. A chemical manufacturing process unit includes pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, instrumentation systems, and control devices or systems.

(b) PhD-285, in which Phenol and Acetone are formed, is an affected facility subject to 40 CFR 60, Subpart RRR. PhD-285 consists of unit operations in which one or more chemicals, or reactants other than air, are combined or decomposed in such a way that their molecular structures are altered and one or more new organic compounds are formed, plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) PhC-650, the cleavage, Acetone, and Phenol distillation unit and recovery system in the Phenol plant, is an affected facility subject to 40 CFR 60, Subpart NNN. PhC-650 consists of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum

pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(d) The Phenol Chemical Manufacturing Plant, identified as FF_CMP, is subject to 40 CFR 61, Subpart FF because it is a facility engaged in the production of chemicals by chemical, thermal, physical, or biological processes for use as a product, co-product, by-product, or intermediate.

(e) PhVV is an affected facility in the Phenol Process Unit subject to 40 CFR 60, Subpart VV. PhVV consists of components assembled to produce Phenol and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(f) [Reserved]

(g) The Phenol Area includes a miscellaneous organic chemical manufacturing unit (MCPU) which is part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing unit is identified as PhMON_PCP. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials in 40 CFR 63.2435(b)(1) that are not otherwise exempted from requirements of 40 CFR 63, subpart FFFF. MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to PhMON_PCP are specified in Section N of this permit.

Phenol Oxidation Process

(h) The Phenol Oxidation Process consists of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-002	E-244	OXIDATE TK VENT CHILLER	None	E-244 is a recovery device	N/A	1979
03-107*	F-235A/B/C/D	CARBON ADSORBERS	Thermal combustion unit (PhTCU)	F-235A/B/C/D is a recovery device	N/A	1979
03-107*	R-670	DETOX	Thermal combustion unit (PhTCU)	None	N/A	1979
N/A	PhDetox WW	PHENOL DETOX WASTEWATER STREAM	None	None	N/A	N/A
N/A	D285	REACTOR PROCESS VENT	None	None	N/A	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))

(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
* Emissions from the combined oxidizers and oxidate settlers can either be vented directly to the atmosphere, through the carbon adsorbers, or through both the carbon adsorbers and the thermal combustion unit.

Phenol Distillation Process

(i) The Phenol Distillation Process consists of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-005	C-650	CLEAVAGE, ACETONE & PHENOL DISTILLATION	None	BACT: condensers + scrubber (E-614, E-314, C-650)	N/A	1979
03-006	E-429	AMS TOP COL VENT CHILLER	None	E-429 is a recovery device	N/A	1979
03-007	H-520	NATURAL GAS FIRED HEAVY ENDS COLUMN REBOILER	None	None	7.7 MMBtu/hr	1979

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

Phenol Hazardous Waste Boilers

(j) The boilers located in the Phenol Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
03-008	H-530A	LIQUID WASTE RESIDUE/GAS FIRED BOILER	None	None	75 mmBtu/hr	1979
03-008	H-530B	LIQUID WASTE RESIDUE/GAS FIRED BOILER	None	None	75 mmBtu/hr	1982

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

Phenol Area Tanks

(k) Tanks located in the Phenol Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
03-009	V-635	PHENOLIC WATER IMPOUNDMENT TANK/AMS SURGE TANK	None	None	802 m^3	1979
03-010	V-630	DEPHENOLATION FEED TANK	None	None	90 m^3	1979
03-011	D-620	SLOP OIL DRUM	None	None	12.8 m^3	1978
03-013	V-520	OFFSITE AMS STORAGE TANK	None	None	69.7 m^3	1979
03-018	V-704C	CUMENE STORAGE TANK	None	None	10,705 m^3	1978
03-019	V-525A	WASTE HYDROCARBON STORAGE TANK	Condenser or flameless thermal oxidizer	None	558 m^3	1979
03-020	V-704A	CUMENE STORAGE TANK	None	None	10,478 m^3	1978
03-021	V-704B	CUMENE STORAGE TANK	None	None	10,478 m^3	1978
03-024	V-701A	PHENOL STORAGE TANK	None	None	1,873 m^3	1978
03-025	V-701B	PHENOL STORAGE TANK	None	None	1,873 m^3	1978
03-031	V-525B	WASTE HYDROCARBON STORAGE TANK	Condenser or flameless thermal oxidizer	None	558 m^3	1982
N/A	V-310B	Splitter Feed Tank	None	None	1,982 m^3	1988
N/A	V-415B	Crude AMS Tank	None	None	601 m^3	1988
N/A	V-701C	PHENOL STORAGE TANK	None	None	1,929 m^3	1988

Note: The condenser or flameless thermal oxidizer is operated pursuant to RCRA requirements and has no applicable limits or operating requirements under this Part 70 operating permit.

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
03-027	V-528	SEAL FLUSH TANK	None	None	less than 8 m^3	1988
03-030	V-720	WASTEWATER STORAGE TANK	None	None	3,875 m^3	1990

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

Phenol Heat Exchange System and Transfer Operations

(l) The Phenol heat exchange system located within the PhCMPU is described as the entire recirculating cooling system which is connected to the cooling towers listed as emission units below and identified as PNL CTC1, PNL CTC2, PNL CTC3, PNL CTC 4, and PNL CTC5.

(m) The Phenol transfer operations located within the PhCMPU are identified as emission units PNL TRUCK and PRC below.

(n) The barge loading operation, identified as BARGE, is associated with the phenol plant. The BARGE operation conducts bulk loading of acetone onto marine tank barges, which activity is a marine tank vessel loading operation under 40 CFR 63 Subpart Y. The acetone contains organic HAP only as an “impurity”, as defined in 40 CFR 63.561. BARGE is a “source with emissions less than 10 and 25 tons”, as defined in 40 CFR 63.561.

Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]
03-032	PNL TRUCK	PHENOL TRUCK LOADING	Scrubber	None
03-033	PRC	PHENOL RAIL CAR LOADING	None	None
03-100	PNL CTC1	PHENOL COOLING TOWER CELL 1	None	None
03-101	PNL CTC2	PHENOL COOLING TOWER CELL 2	None	None
03-102	PNL CTC3	PHENOL COOLING TOWER CELL 3	None	None
03-103	PNL CTC4	PHENOL COOLING TOWER CELL 4	None	None
03-104	PNL CTC5	PHENOL COOLING TOWER CELL 5	None	None
	BARGE	ACETONE BARGE LOADING	None	None

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

Phenol Waste

(o) The Phenol area waste is identified as:

(1) A process wastewater stream discarded from the PhCMPU identified as Dephenate Stream which contains a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight; and

(2) HON Maintenance Wastewater, discarded from the PhCMPU that contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G; and

(3) The Benzene containing waste subject to the Benzene Waste Operations NESHAP, 40 CFR 61, Subpart FF, discarded from the Phenol Chemical Manufacturing Plant. FF_CMP identifies the benzene-containing hazardous waste stream(s) generated by the production of chemicals by chemical, thermal, physical, or biological processes for use as a product, co-product, by-product, or intermediate and is either treated, stored, or disposed of.

Phenol Leak Detection and Repair (LDAR) Components

(p) The Phenol chemical manufacturing process unit (CMPU) consists of equipment subject to LDAR. LDAR applies to Phenol CMPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year and/or volatile organic compound (HAP/VOC) service for any amount of time during the calendar year. In HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. In VOC service means that a piece of equipment either contains or contacts a fluid that is at least 10 percent VOC by weight.

Certain liquid streams in open systems

(q) The Phenol chemical manufacturing process units (PhCMPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the PhCMPU components described as:

(1) A drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

A.5 BPA [Section F]

A.5.1 BPA, Buildings 15, 31, 56, and 49

BPA Affected Facilities/Sources

(a) The BPA Chemical Manufacturing Process Unit (BpaCMPU) subject to 40 CFR 63, Subpart F, G, and H is identified by its primary product, which is Bisphenol-A. The BpaCMPU consists of equipment assembled and connected by pipes or ducts to process raw materials and to manufacture Bisphenol-A. A chemical manufacturing process unit consists of more than one unit operation. The BpaCMPU includes reactors and their associated product separators and recovery devices; distillation units and their associated distillate receivers and recovery devices; associated unit operations; associated recovery devices; and any feed, intermediate and product storage vessels, product transfer racks, and connected ducts and piping. A chemical manufacturing process unit includes pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, instrumentation systems, and control devices or systems.

(b) The affected facilities subject to 40 CFR 60, Subpart NNN are identified as BpaV-6100 and BpaH-383. The affected facilities consist of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) The affected source subject to 40 CFR 63, Subpart NNNNN is identified as BpaNNNNN. The affected source is the group of HCl production facilities in the BPA plant which consist of unit operations and equipment that are associated with the production of liquid HCl product at a concentration of 30 weight percent or greater during normal operations.

(d) BpaVV is an affected facility in the BPA Process Unit subject to 40 CFR 60, Subpart VV. BpaVV consists of components assembled to produce Bisphenol-A and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(e) [Reserved]

BPA Process Operations

(f) The BPA process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
04-015	V-371	PHENOL VENT HEADER KNOCK OUT TANK IN BPA I & II	V-472 scrubber system	V-371 is recovery device	Less than $40m^3$	1981
04-020	M-450	BPA II VACUUM JET	None	None	N/A	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-032	M-417	PHENOL VACUUM JET IN BPA II	None	None	N/A	N/A
04-044	M-367	TAR DISTILLATION VACUUM SYSTEM IN BPA I	None	None	N/A	N/A
04-050	H-6060	BPA III VENT INCINERATOR	None	None	N/A	N/A
04-200	M-309	ACID JET IN BPA I	None	None	N/A	N/A
04-201	M-410	ACID JET IN BPA II	None	None	N/A	1975
04-202	M-455	ACID JET IN BPA II	None	None	N/A	N/A
N/A	H-383	TAR CRACKER PHENOL CONDENSER IN BPA I	None	Condenser	N/A	N/A
Insignificant Activities [d]						
Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-074	V-6100	EXTRACTION KO TANK IN BPA I, II, & III	None	None	Less than 40m^3	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[d] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

BPA Flaking, Loading, and Silo Operations

(g) The BPA flaking, loading, and silo operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
04-098	F-231	BPA FLAKER I DUST COLLECTOR IN BPA I & II	None	Bagfilter	12 tons/hr	1990
04-098	F-232	BPA FLAKER II DUST COLLECTOR IN BPA I & II	None	Bagfilter	12 tons/hr	1990

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
04-026	V-701A BF	SILO 701A RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-027	V-339-BF	SILO 339 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-028	V-338-BF	SILO 338 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-029	V-335-BF	SILO 335 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-030	V-507B-BF	SILO 507B RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
04-031	V-507A-BF	RECEIVER FOR BPA III STORAGE SILO V-507A IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-034	V-701B-BF	SILO 701B RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-035	V-701C-BF	SILO 701C RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-039	V-701D-BF	SILO 701D RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-040	V-701E-BF	SILO 701E BIN VENT IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-064	V-5050-NF	SILO V-5050 RECEIVER (F-5052) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-065	V-5060-NF	SILO V-5060 BIN VENT (F-5062) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-066	F-801D-F	NORTHWEST TRUCK & RAIL LOADING STATION RECEIVER IN BPA II	None	Bagfilter	12 tons/hr	N/A
04-069	B-5030 A	BLOWER (B-5030A) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-070	B-5030 B	BLOWER (B-5030B) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-083	RRLSF	SOUTHWEST TRUCK & RAIL LOADING STATION RECEIVER IN BPA II	None	Cyclone & Bagfilter	12 tons/hr	N/A
04-086	V-701A-NF	SILO 701A BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-087	V-701B-NF	SILO 701B BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-088	V-701C-NF	SILO 701C BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-089	V-701D-NF	SILO 701D BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-090	V-701E-NF	SILO 701E BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-091	V-338-NF	SILO 338 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-092	V-339-NF	SILO 339 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-093	V-335-NF	SILO 335 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-094	V-507A-NF	SILO 507A BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-095	V-507B-NF	SILO 507B BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-101	TRLSF	EAST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA I	None	Bagfilter	12 tons/hr	N/A
04-207	B-5030S	BPA III SPARE BLOWER	None	Bagfilter	12 tons/hr	N/A
04-208	BPA CLNS1	BPA I/II CLOSED LOOP NITROGEN SYSTEM 1	None	Bagfilter	12 tons/hr	N/A
04-209	BPA CLNS2	BPA I/II CLOSED LOOP NITROGEN SYSTEM 2	None	Bagfilter	12 tons/hr	N/A
04-214	NTRL	NORTHWEST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-215	SWTRL	SOUTHWEST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-217	K-701A	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K-701A) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-218	K-701B	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K701B) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-219	K-701C	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K-701C) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-220/220A	CLN RCU	CLOSED LOOP NITROGEN RAILCAR UNLOADING	None	Bagfilter	4.5 tons/hr	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

BPA Area Tanks

(h) Tanks located in the BPA Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered

integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-003	V-402	PHENOL STORAGE TANK IN BPA I & II	None	None	2,178 m^3	1974
04-072	V-1010	MIBK STORAGE TANK IN BPA III	None	None	57.5 m^3	1985
04-102	V-7066	50% GLYCOL STORAGE TANK IN BPA III	None	None	48 m^3	1985
N/A	V-1040	PHENOL STORAGE IN BPA III	None	None	267 m^3	1985
N/A	V-1060	STORAGE TANK IN BPA III	None	None	973 m^3	1985
N/A	V-1070	STORAGE TANK IN BPA III	None	None	130 m^3	1984
N/A	V-1090	STORAGE TANK IN BPA III	None	None	267 m^3	1985
N/A	V-221	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-222	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-223	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-224	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-225	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-226	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-230	STORAGE TANK IN BPA I & II	None	None	41 m^3	1991
N/A	V-3030	STORAGE TANK IN BPA III	None	None	32 m^3	1985
N/A	V-427	STORAGE TANK IN BPA II	None	None	36 m^3	1995
N/A	V-428	STORAGE TANK IN BPA II	None	None	36 m^3	1995
N/A	V-474	STORAGE TANK IN BPA II	None	None	57.6 m^3	1985

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-002	V-401	ACETONE STORAGE TANK IN BPA I & II	None	None	64 m^3	N/A
04-059	V-7090	HOT OIL STORAGE TANK IN BPA III	None	None	22 m^3	N/A
04-061	V-7091	OIL STORAGE TANK IN BPA III	None	None	3.5 m^3	N/A
04-073	V-1080	ACETONE STORAGE TANK IN BPA III	None	None	487 m^3	N/A
04-080	V-1081	ACETONE EXTRACTION TANK IN BPA III	None	None	17 m^3	N/A
04-099	V-250/260	V-250/V-260 HOT OIL STORAGE TANK IN BPA II	H-280 Condenser	None	159 m^3	1991
04-212	V-477	HOT OIL VENT KNOCK OUT TANK BPA I & II	None	None	28 m^3	N/A
15-006	V-209	VENT TANK V-209 IN BPA PILOT PLANT	C-294 Scrubber	None	3.4 m^3	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

BPA Oil Heating Operations

(i) The BPA oil heating operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-100	M-250	HOT OIL FURNACE IN BPA II burns natural gas	None	None	42 MMBtu/hr	1990
04-213	M-475	HOT OIL HEATER IN BPA I & II burns natural gas	None	None	22 MMBtu/hr	1975

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-047	M-364	TAR CRACKER OIL HEATER IN BPA I burns natural gas	None	None	4 MMBtu/hr	N/A
04-063	H-7090	BPA III HOT OIL HEATER burns natural gas	None	None	4 MMBtu/hr	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[d] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

BPA Heat Exchange System and Area Waste

(j) The BPA heat exchange system located within the BpaCMPU is described as the entire recirculating cooling system which is connected to the cooling towers identified as BPA CTC1, BPA CTC2, and BPA CTC3.

(k) The BPA area waste is identified as:

(1) A process wastewater stream discarded from the BpaCMPU identified as Glitsch Col Stream which contains a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight; and

(2) HON maintenance wastewater discarded from the BpaCMPU that contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G.

BPA Leak Detection and Repair (LDAR) Components

(l) The BPA chemical manufacturing process unit (BpaCMPU) consists of equipment subject to LDAR. LDAR applies to the BpaCMPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or

lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year and/or volatile organic compound (HAP/VOC) service for any amount of time during the calendar year. In HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. In VOC service means that a piece either contains or contacts a fluid that is at least 10 percent VOC by weight.

Certain liquid streams in open systems

(m) The BPA chemical manufacturing process unit (BpaCMPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the BpaCMPU components described as:

(1) A drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

A.6 LEXAN# Resin [Section G]

A.6.1 LEXAN# Resin, Buildings 14 and 16

LEXAN# Resin Affected Facilities/Sources

(a) The LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) subject to 40 CFR 63, Subpart YY is identified by its primary product, which is polycarbonate. The LxrPPPU includes any equipment, such as a pump, compressor, agitator, pressure relief device, sampling collection system, open-ended valve or line, valve, connector, and instrumentation system in organic hazardous air pollutant service that is assembled and connected by pipes or ducts to process raw and/or intermediate materials to manufacture polycarbonate by interfacial polymerization from bisphenols and phosgene. The LxrPPPU includes the reactor in which phosgene is formed and all equipment downstream of the reactor that provides phosgene for the production of polycarbonate; this part of the LxrPPPU is identified as PhosF-972 and the specific requirements of process vent F-972 can be found in Section I.1.

(b) MeCL_Eq identifies the part of the LEXAN# Resin Polycarbonate Production Process Unit subject to 40 CFR 63, Subparts H and I (MeCL_Eq) because it produces polycarbonates and emits methylene chloride. The MeCL_Eq includes only equipment that is in methylene chloride service. In methylene chloride service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight of methylene chloride. The LxrPPPU includes the MeCL_Eq equipment, but the MeCL_Eq equipment is regulated under 40 CFR 63, Subpart H and I instead of 40 CFR 63, Subpart YY.

LEXAN# Resin Process Operations

(c) The LEXAN# Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description;

the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-007	V-723	RESIN II VENT GAS ABSORBER	None	V-723 is a recovery device	35.82 tons/hour	1991
05-008	F-705	RESIN II V-712 BPA RECEIVER	None	Bagfilter	12.11 tons/hour	1984
05-009	F-706	RESIN II V-713 BPA RECEIVER	None	Bagfilter	12.11 tons/hour	1984
05-013	V-519	RESIN I & II VENT GAS ABSORBER	None	V-519 is a recovery device	35.82 tons/hour	1990
05-016	F-741	RESIN II POST DRYER SURGE HOPPER BIN VENT	None	Bagfilter	30 tons/hour	1971

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-004	V-334 BF	TBBPA SILO RECEIVER	None	Bagfilter	7.5 tons/hour	
05-010	F-737	RESIN II WEIGH HOPPER BIN VENT	None	Bagfilter	18.55 tons/hour	
05-011	F-742	RESIN II V-712 BIN VENT	None	Bagfilter	9.28 tons/hour	
05-012	F-743	RESIN II V-713 BIN VENT	None	Bagfilter	9.28 tons/hour	
05-014	F-553	RESIN I BPA RECEIVER FOR V-567	None	Bagfilter	3.76 tons/hour	
05-015	F-515R	RESIN I BPA RECEIVER FOR V-546	None	Bagfilter	3.76 tons/hour	
05-017	V-598	RESIN I V-598 SURGE HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	
05-019	V-508	RESIN I WEIGH HOPPER BIN VENT	None	Bagfilter	7.52 tons/hour	
05-028	F-546	RESIN I V-546 USE BIN VENT	None	Bagfilter	3.76 tons/hour	
05-029	V-567 BF	RESIN I V-567 BPA USE BIN VENT	None	Bagfilter	3.76 tons/hour	
05-030	F-7735	RESIN III INTERMEDIATE SURGE HOPPER BIN VENT	None	Bagfilter	30 tons/hour	
05-031	F-7733	RESIN III POST DRYER SURGE HOPPER BIN VENT	None	Bagfilter	30 tons/hour	
05-041	V-7756A	RESIN IIA AIR STRIP RECEIVER	None	Bagfilter	10 tons/hour	
05-042	V-7756B	RESIN IIB AIR STRIP RECEIVER	None	Bagfilter	10 tons/hour	
05-043	F-7751A	RESIN II A COLUMN HOPPER BIN VENT	None	Bagfilter	10 tons/hour	

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
05-044	F-7751B	RESIN II B COLUMN HOPPER BIN VENT	None	Bagfilter	10 tons/hour	
05-045	F-7751C	RESIN II C COLUMN HOPPER BIN VENT	None	Bagfilter	10 tons/hour	
05-046	F-5711	RESIN III D DRYER AIR STRIP RECEIVER	None	Bagfilter	10 tons/hour	
05-047	F-5705	RESIN III D COLUMN HOPPER BIN VENT	None	Bagfilter	15 tons/hour	
05-048	V-7756C	RESIN II C DRYER AIR STRIP RECEIVER	None	Bagfilter	10 tons/hour	
05-050	F-5720 BF	RESIN III BPA RECEIVER	None	Bagfilter	9.05 tons/hour	
05-051	F-5722 BF	RESIN III BPA USE BIN VENT	None	Bagfilter	9.05 tons/hour	
05-052	F-5724 BF	RESIN III BPA WEIGH HOPPER BIN VENT	None	Bagfilter	9.05 tons/hour	
05-053	F-5761A	RESIN I A V-5761A COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	
05-054	F-5761B	RESIN I B V-5761B COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	
05-055	F-5761C	RESIN I C V-5761C COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	
05-056	F-5776	RESIN I SPECIALS DRYER SCRUBBER	None	Peabody Scrubber	7.5 tons/hour	
05-057	F-5778	RESIN I V-5770 SURGE HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	
05-058	F-5870	RESIN I SURGE HOPPER RHEOMETER FOR F-5870	None	Vac-U-Max Filter	0.05 tons/hour	
05-059	F-5871	RESIN I SURGE HOPPER RHEOMETER FOR F-5871	None	Vac-U-Max Filter	0.05 tons/hour	
05-060	Z-5873	RESIN I FEED SCRUBBER	Scrubber*	N/A	7.5 tons/hour	
05-061	F-506A	DDDA RECEIVER FOR SILO V-506A	None	Bagfilter	7.5 tons/hour	
05-062	F-506	DDDA RECEIVER	None	Bagfilter	7.5 tons/hour	
05-073	F7737	RESIN III POST DRYER FEED RECEIVER FOR V-7731	None	Bagfilter	30 tons/hour	
05-074	F-7736	RESIN III POST DRYER FEED RECEIVER FOR V-749	None	Bagfilter	30 tons/hour	
05-075	V-506A	DDDA SILO V-506A UNFILTERED VENT	None	None	7.5 tons/hour	
05-150	WPDR1	RESIN I PEABODY SCRUBBER	None	Peabody Scrubber	7.5 tons/hour	
05-151	WPDR2	RESIN II PEABODY SCRUBBER	None	Peabody Scrubber	30 tons/hour	
05-152	WPDR3	RESIN III PEABODY SCRUBBER	None	Peabody Scrubber	15 tons/hour	
05-154	FDFS	RESIN III FLASH DRYER FAN SCRUBBER	None	Scrubber	15 tons/hour	
05-156	F-5728	SUPERSACK UNLOADER UNIT	None	Bagfilter	7.5 tons/hour	
05-157	F-5723	USE BIN FILTER	None	Bagfilter	7.5 tons/hour	
05-158	CLN TRANS	CLN TRANSFER SYSTEM	None	Bagfilter	7.5 tons/hour	
05-159	F-5786	HI HEAT SURGE BIN SYSTEM	None	Bagfilter	7.5 tons/hour	

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* There are no control requirements required for the scrubber associated with stack/vent ID 05-060 because uncontrolled emissions/hour are only about 40 percent of the allowable emissions for this emission unit.

LEXAN# Resin Area Tanks

(d) Tanks located in the LEXAN# Resin Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum tank volume capacity, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-005	V-706	V-706 STORAGE TANK WITH SCRUBBER*	None	None	22.7 m^3	1970
N/A	V-5502	SOLUTION BLENDING TANK	None	None	75.7 m^3	N/A
N/A	V-5503	FRESH METHYLENE CHLORIDE STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-5504	RECYCLE METHYLENE CHLORIDE STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-5510	SOLUTION BLENDING STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-711A	RECYCLE SOLVENT STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-711B	RECYCLE SOLVENT STORAGE TANK	None	None	75.7 m^3	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-040	V-5509	TEA STORAGE TANK WITH VENT SCRUBBER*	None	None	22.9 m^3	N/A
05-049	V-5780	PTC TANK	None	None	34.1 m^3	N/A
05-071	V-5506	PCP STORAGE TANK WITH VENT SCRUBBER*	None	None	69.7 m^3	N/A
05-072	V5508	DAC STORAGE TANK WITH VENT SCRUBBER*	None	None	69.8 m^3	N/A
05-155	V-5784	RESORCINOL TANK V-5784 WITH VENT SCRUBBER*	None	None	88.9 m^3	N/A
05-160	F-5787	HIGH HEAT MIXING TANK	None	None	22.3 m^3	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))

(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))
* Scrubber not required by any air regulation requirements.

LEXAN# Resin Waste

(e) The LEXAN# Resin area waste is identified below as:

(1) The process wastewater streams discarded from the LxrPPPU:

(A) Contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 10,000 parts per million by weight at any flow rate; or

(B) Contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight at an annual average flow rate greater than or equal to 10 liters per minute; and

(2) GMACT Maintenance Wastewater discarded from the LxrPPPU and contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G. Some of the GMACT Maintenance Wastewater is associated with the Phosgene production unit located in Building 6 which is considered part of the polycarbonate production process unit identified as LxrPPPU.

P&ID No.	Wastewater Stream ID[(a)]	Wastewater Stream Unit Description
5-F-12G	2"-DR-A-512E-007	TEA Storage Tank Vent Scrubber F-5509 Drain
5-F-28A	4"-WNB-Yd-528A-63	Resin I Non-Brine Discharge to WWTP
5-F-28A	4"-P	Analyzer Sample Point for Resin I Non-Brine Discharge to WWTP
5-F-28A	½"-WNB-P-528A-68	Sample Point for Resin I Non-Brine Discharge to WWTP (Hot Sample)
5-F-28A	½"-WNB-Qt-528A-69	Sample Point for Resin I Non-Brine Discharge to WWTP (Cooled Sample)
5-F-28C	1/2"-BRP-Qt-528C-69	Brine Sample Point
5-F-28C	1/2"-BRP-Qt-528C-70	Brine Sample Point
5-F-28D	6"-BRP-D-528D-04	Brine to Brine Recovery Plant
5-F-50B	1"-DR-P-550B-70	S.D. Powder Scrubber F-5776 Vent Humidifier
5-F-50B	1 1/2"-PV-P-550B-77	S.D. Powder Scrubber F-5776 Water Seal Drain
5-F-50B	3"-MWR-P-550B-19	S.D Powder Scrubber F-5776 Level Control Drain
5-F-101A	1/2"-NAOH-Qt-5101A-024	Caustic Sample Loop Off of RI Primary Caustic Scrubber V-5532 and V-5533
7-F-26	1"-WDI-P-726-43	Post Dryer Powder Scrubber F-733 Level Control Drain
7-F-101A	½"-NAOH-P-7101A-027	Caustic Sample Loop Off of RII Primary Caustic Scrubber V-7721 and V-7722
7-F-116A	6"-WNB-P-7116A-34	RII Non Brine Discharge to WWTP
7-F-116A	½"-WNB-P-7116A-60	Conductivity Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-116A	4"-P	Analyzer Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-116A	½"-WNB-P-7116A-60	Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-142	1 ½"-MWS-P-7142-58	Post Dryer Powder Scrubber F-7734 Level Control Drain
7-F-162	1 ½"-WNB-P-7162-16-HW	Flash Dryer Powder Scrubber F-7806B Level Control Drain
5-F-26	1"-WDI-P-526-65	Post Dryer Powder Scrubber F-590 Level Control Drain
900-F-73C	1"-MWS-A-73C-028	Neutralizer Tank V-951 (Aqueous Phase)
N/A	N/A	GMACT MAINTENANCE WASTEWATER

[(a)] Each wastewater stream is identified with an affiliated P&ID number and wastewater stream unit description.

LEXAN# Resin Leak Detection and Repair (LDAR) Components

(f) The LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) consists of equipment subject to LDAR. LDAR applies to:

(1) The collection of all LxrPPPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or lines, valves, connectors, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year. In organic HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. Some of this equipment is routed through a closed vent system, identified as LxrCVS1 and into an emergency vent scrubber, identified as LxrEVS or through a closed vent system, identified as PhosCVS1 and into an emergency vent scrubber, identified as PhosC-964.

(2) The collection of all MeCL_Eq components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems that are in methylene chloride service. In methylene chloride service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight of methylene chloride. For clarification purposes, MeCL_Eq components are part of the LxrPPPU, but are regulated under 40 CFR 63, Subpart H and I instead of 40 CFR 63, Subpart YY.

Certain liquid streams in open systems

(g) The LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the LEXAN# Resin PPPU components described as:

(1) A drain, drain hub, manhole (including sumps and other points of access to a conveyance system), lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flow rate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank with capacity equal to or greater than 38 cubic meters that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

A.7 Brine Recovery [Section H]

A.7.1 Brine Recovery, Building 32

Brine Recovery Affected Facilities/Sources

(a) BR-ASBSTOS is the operation for manufacture of chlorine using asbestos diaphragm technology, which is subject to 40 CFR 61, Subpart M. This operation includes an enclosed work area controlled by a vent scrubber, identified as V-40-1, which exhausts to one (1) stack, identified as 06-034.

Brine Recovery Operations

(b) The Brine Recovery operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
06-008	V-70-4C	HCL SYNTHESIS SCRUBBER TOWER VENT(V70-10)*	None	None	N/A	N/A

Insignificant Activities[(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
06-006	V70-2	HCL TANK TRUCK TRANSFER AND STORAGE VENT SCRUBBER (V70-2)*	None	None	N/A	N/A
06-010	V20-5	BRINE SURGE TANK (V20-5)	None	None	N/A	N/A
06-011	ACID SUMP	ACID SUMP	None	None	N/A	N/A
06-012	V20-7	ACID BRINE STRIPPER (V20-7)	None	None	N/A	N/A
06-035	V-53-1	ENCLOSURE VENTILATION SCRUBBER (EVS) (V53-1)**	None	None	N/A	N/A
06-055	V20-21	RAW BRINE STORAGE TANK (V20-21)	None	None	N/A	N/A
06-058	V70-3	HCL RAILCAR LOADING STATION WITH SCRUBBER (V70-3)*	None	None	N/A	N/A
06-061	V20-17A	NORTH COOLING POND (V20-17A)	None	None	N/A	N/A
06-062	V20-17B	SOUTH COOLING POND (V20-17B)	None	None	N/A	N/A
06-064	V20-15B	ACIDIFICATION/DEGASSING TANK (V20-15B)	None	None	N/A	N/A
06-067	V53-2A	ENCLOSURE VENTILATION SCRUBBER (EVS) CIRCULATION TANK (V53-2A)	None	None	N/A	N/A
06-068	V53-2B	ENCLOSURE VENTILATION SCRUBBER (EVS) CIRCULATION TANK (V53-2B)	None	None	N/A	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* Scrubber controls hydrogen chloride fumes and is not required by any air regulation requirements.

** V-53-1 is a scrubber used to contain and destroy fugitive or accidental releases of chlorine gas that may occur inside the chlorine enclosure area of the brine recovery operations. This scrubber is a safety system integral to process operations and is not considered a control or recovery device.

A.8 Phosgene [Section I]

A.8.1 Phosgene, Building 6

Phosgene Affected Facilities/Sources

(a) The Phosgene Reaction, Purification, and Transfer Operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
08-001	F-972	TAIL GAS SEPARATOR (WITH FLARE H-961)*	One of two scrubber systems: (C-962 and C-963) OR (C-966 and C-967)	None	N/A	1979
08-004	F-902	CARBON SYSTEM BLOWER TRANSFER CYCLONE (K-909)	None	Bagfilter	2.0 tons/hr	N/A
08-007	V-967	EVS CAUSTIC SCRUBBER VENT C964	Scrubber C964	None	N/A	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
08-003	F-901	CARBON SYSTEM BLOWER RAILCAR UNLOADING (K-901)	None	Bagfilter	2.0 tons/hr	N/A
08-005	V-969	VENT SCRUBBER RECIRCULATION TANK (V-969)	None	None	N/A	N/A
08-006	V-971A	CAUSTIC MAKE-UP TANK (V-971A)	None	None	N/A	N/A
08-008	V-951	CARBON TET. NEUTRALIZATION AND DRUM-OFF STATION (V-951)	None	None	N/A	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* H-961 is used to control CO emissions in the gas stream exiting the tail gas scrubber system. There are no regulatory requirements for this flare.

Phosgene Carbon Monoxide Generators and COS (Carbonyl Sulfide) Stream

(b) The Phosgene Carbon Monoxide Generators consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device

(considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[(a)]

Stack / Vent I.D	Emission Unit*	Emission Unit Description	Air Pollution Control Devices**	Integral Devices(b) ***	Maximum Capacity[(c)]	Date of Construct
08-010	COG1	CO GENERATOR NO. 1	COS Vent Oxidizer (08-706) OR COS Flare (08-707)	Carbon Adsorbers V-948, V-949, V-050A, V-951A, V-9020, V-9021	0.17 tons/hr	N/A
08-011	COG2	CO GENERATOR NO. 2			0.17 tons/hr	N/A
08-012	COG3	CO GENERATOR NO. 3			0.17 tons/hr	N/A
08-013	COG4	CO GENERATOR NO. 4			0.17 tons/hr	N/A
08-014	COG5	CO GENERATOR NO. 5			0.17 tons/hr	N/A
08-015	COG6	CO GENERATOR NO. 6			0.17 tons/hr	N/A
08-016	COG7	CO GENERATOR NO. 7			0.17 tons/hr	N/A
08-017	COG8	CO GENERATOR NO. 8			0.17 tons/hr	N/A
08-018	COG9	CO GENERATOR NO. 9			0.17 tons/hr	N/A
08-019	COG10	CO GENERATOR NO. 10			0.17 tons/hr	N/A
08-020	COG11	CO GENERATOR NO. 11			0.17 tons/hr	N/A
08-021	COG12	CO GENERATOR NO. 12			0.17 tons/hr	N/A
08-022	COG13	CO GENERATOR NO. 13			0.17 tons/hr	N/A
08-023	COG14	CO GENERATOR NO. 14			0.17 tons/hr	N/A
08-024	COG15	CO GENERATOR NO. 15			0.17 tons/hr	N/A
08-025	COG16	CO GENERATOR NO. 16			0.17 tons/hr	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

* The 16 CO generators operate in a continuous mode and the CO produced by the generators is normally routed through the purification system and into the phosgene reactor Each of the 16 generators has a stack/vent that is only used during startup, shutdown, and malfunction events.

** In addition to having the option to use the Oxidizer (08-706) for controlling organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either the Erie Boiler, Lasker Boiler, B&W Boiler, and/or Riley Boiler. These boilers are described in Section K of this permit. The COS Flare (08-707) only serves as back-up to the COS Vent Oxidizer (08-706) and during safety interlock of the system.

*** These carbon adsorbers purify the carbon monoxide as it flows from the CO generators to the phosgene reactor. Without the purification, the carbon monoxide quality is not adequate to produce phosgene that is suitable for use in polycarbonate production. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide.

<u>Phosgene Heat Exchange System and Area Waste</u>

(c) The Phosgene heat exchange system includes cooling towers identified as PHG CTC1, PHG CTC2, PHG CTC3, PHG CTC4, PHG CTC5, PHG CTC6, PHG CTC7, PHG CTC8.

(d) The Phosgene area waste includes a process wastewater stream discarded from the LxrPPPU which does not contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G greater than or equal to 1,000 parts per million by weight with an annual average flow rate greater than or equal to 10 liters per minute. This wastewater stream is identified as 1"-MWS-A-73C-028 and is associated with P&ID

No. 900-F-73C; this stream is described as a Neutralizer Tank V-951 (Aqueous phase). For clarification purposes, general requirements for the LxrPPPU can be found in Section G.1 of this permit.

A.9 LEXAN# Finishing [Section J]

A.9.1 LEXAN# Finishing, Building 13

LEXAN# Finishing Operations

(a) The LEXAN# Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-148	SILO 67	RESIN SILO 67	None	Filter	32.5 tons/hour	N/A
07-149	SILO 68	RESIN SILO 68	None	Filter	32.5 tons/hour	N/A
07-156	SILO 69	RESIN SILO 69	None	Filter	32.5 tons/hour	N/A
07-157	SILO 70	RESIN SILO 70	None	Filter	32.5 tons/hour	N/A
07-188	SILO 71	RESIN SILO 71	None	Filter	32.5 tons/hour	1995

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-001	CMEX	COLOR MATCHING EXTRUDER	None	None	less than 100 lb/hr	N/A
07-002	MM4	MOLDING MACHINE #4	None	None	less than 100 lb/hr	N/A
07-002	MM5	MOLDING MACHINE #5	None	None	less than 100 lb/hr	N/A
07-002	MM6	MOLDING MACHINE #6	None	None	less than 100 lb/hr	N/A
07-011	QAFOH	QA FLAME OUT HOOD	None	None	less than 100 lb/hr	N/A
07-012	QAAH	QA ASHING HOOD	None	None	less than 100 lb/hr	N/A
07-013	QA SP HOOD	QA SAMPLE PREPARATION HOOD	None	None	less than 100 lb/hr	N/A
07-015	L-20 PB	LINE 20 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-016	L-21 PB	LINE 21 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	2.5 tons/hour	N/A
07-017	M&N DUST	M & N VERTIMIXERS BAGHOUSE	None	Filter	0.63 tons/hour	N/A
07-018	L-22 PB	LINE 22 POWDER BIN FILTER	None	Filter	2.30 tons/hour	N/A
07-019	L-23 PB	LINE 23 POWDER BIN FILTER	None	Filter	1.13 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-020	L-24 PB	LINE 24 POWDER BIN FILTER	None	Filter	2.48 tons/hour	N/A
07-022	L-25 PB	LINE 25 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-023	SP1-BF	POT #1 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-024	SPA-BF	POT A BAG HOUSE	None	Filter	7.5 tons/hour	N/A
07-025	L-26PR	LINE 26 POWDER BIN FILTER	None	Filter	1.75 tons/hour	N/A
07-026	L-27PB	LINE 27 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-027	L-28PB	LINE 28 POWDER BIN FILTER	None	Filter	4.25 tons/hour	N/A
07-028	L-29PB	LINE 29 POWDER BIN FILTER	None	Filter	4.25 tons/hour	N/A
07-029	SPB-BF	POT B BAG HOUSE	None	Filter	7.5 tons/hour	N/A
07-030	L-30PB	LINE 30 POWDER BIN FILTER	None	Filter	3.25 tons/hour	N/A
07-031	L-31PB	LINE 31 POWDER BIN FILTER	None	Filter	3.25 tons/hour	N/A
07-032	SILO 57 RH	RESIN SILO 57	None	Filter	32.5 tons/hour	N/A
07-033	SILO 58 RH	RESIN SILO 58	None	Filter	32.5 tons/hour	N/A
07-034	L-28 RH	LINE #28 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-035	L-27 RH	LINE #27 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-036	L-26 RH	LINE #26 ROOF HOPPER BAG HOUSE	None	Filter	1.75 tons/hour	N/A
07-037	L-25 RH	LINE #25 ROOF HOPPER BAG HOUSE	None	Filter	2.75 tons/hour	N/A
07-038	L-24 RH	LINE #24 ROOF HOPPER BAG HOUSE	None	Filter	2.75 tons/hour	N/A
07-039	L-23 RH	LINE #23 ROOF HOPPER BAG HOUSE	None	Filter	1.25 tons/hour	N/A
07-040	L-22 RH	LINE #22 ROOF HOPPER BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-041	L-21 RH	LINE #21 ROOF HOPPER BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-042	L-20 RH	LINE #20 ROOF HOPPER BAG HOUSE	None	Filter	1.75 tons/hour	N/A
07-043	SILO 59RH	RESIN SILO 59	None	Filter	32.5 tons/hour	N/A
07-044	SILO 60 RH	RESIN SILO 60	None	Filter	32.5 tons/hour	N/A
07-045	SILO 61 RH	RESIN SILO 61	None	Filter	32.5 tons/hour	N/A
07-046	SILO 62 RH	RESIN SILO 62	None	Filter	32.5 tons/hour	N/A
07-049	L-10 BV	LINE #10 ROOF HOPPER BAGHOUSE	None	Filter	1.25 tons/hour	N/A
07-050	L-11 BV	LINE #11 ROOF HOPPER BAGHOUSE	None	Filter	1.75 tons/hour	N/A
07-051	L-12 BV	LINE #12 ROOF HOPPER BAGHOUSE	None	Filter	1.25 tons/hour	N/A
07-052	L-13 BV	LINE #13 ROOF HOPPER BAGHOUSE	None	Filter	0.55 tons/hour	N/A
07-053	L-14 BV	LINE #14 ROOF HOPPER BAGHOUSE	None	Filter	1.5 tons/hour	N/A
07-054	L16ED	LINE 16 EXTRUDER, DIE AND VACUUM VENT	None	N/A	0.75 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-055	L-15 RH	LINE #15 ROOF HOPPER BAGHOUSE	None	Filter	1.5 tons/hour	N/A
07-056	L-16 RH	LINE #16 ROOF HOPPER BAGHOUSE	None	Filter	0.75 tons/hour	N/A
07-057	L-17 RH	LINE #17 ROOF HOPPER BAGHOUSE	None	Filter	0.75 tons/hour	N/A
07-059	L13ED	LINE 13 EXTRUDER AND DIE VENT	None	None	0.55 tons/hour	N/A
07-060	L17ED	LINE 17 EXTRUDER, DIE AND VACUUM VENT	None	None	0.75 tons/hour	N/A
07-061	L15ED	LINE 15 EXTRUDER AND DIE VENT	None	None	1.5 tons/hour	N/A
07-062	L14ED	LINE 14 EXTRUDER AND DIE VENT	None	None	1.5 tons/hour	N/A
07-063	L27ED	LINE 27 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-064	L10 ED	LINE 10 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-065	L11ED	LINE 11 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-066	L12ED	LINE 12 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-067	L26ED	LINE 26 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-069	L24ED	LINES 23, 24 & 25 EXTRUDER, DIE AND VACUUM VENTS THROUGH HEAF #2 (SOUTH)	HEAF1 or HEAF2	None	N/A	N/A
07-070	L23ED	LINES 23, 24 & 25 EXTRUDER, DIE AND VACUUM VENTS THROUGH HEAF #1 (NORTH)	HEAF1 or HEAF2	None	N/A	N/A
07-070	L25ED	LINE 25 EXTRUDER AND DIE VENT	HEAF1 or HEAF2	None	N/A	N/A
07-071	L22ED	LINE 22 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-072	L21ED	LINE 21 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-073	L20ED	LINE 20 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-075	PBAGGER 1	POWDER BAGGER #1 ROOF HOPPER RECEIVER	None	Filter	7.5 tons/hour	N/A
07-076	DFOST	DIESEL FUEL OIL STORAGE TANK	None	None	N/A	N/A
07-079	PDC-C	PACKAGING DUST COLLECTOR C BAG HOUSE	None	Filter	0.55 tons/hour	N/A
07-080	PDC-D	PACKAGING DUST COLLECTOR D BAG HOUSE	None	Filter	0.55 tons/hour	N/A
07-086	REC FIL E	RECYCLE BAG HOUSE BLOWER E	None	Filter	8.35 tons/hour	N/A
07-087	REC FIL F	RECYCLE BAG HOUSE BLOWER F	None	Filter	8.35 tons/hour	N/A
07-092	L10EVP	Line 10 Extruder Vacuum Pump	None	None	1.25 tons/hour	N/A
07-092	L11EVP	Line 11 Extruder Vacuum Pump	None	None	1.75 tons/hour	N/A
07-092	L15EVP	Line 15 Extruder Vacuum Pump	None	None	1.5 tons/hour	N/A
07-092	L17EVP	LINE 17 EXTRUDER VACUUM PUMP	None	None	0.75 tons/hour	N/A
07-094	SILO 63	RESIN SILO 63	None	Filter	32.5 tons/hour	N/A
07-095	SILO 64	RESIN SILO 64	None	Filter	32.5 tons/hour	N/A
07-096	SILO 65	RESIN SILO 65	None	Filter	32.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-097	SILO 66	RESIN SILO 66	None	Filter	32.5 tons/hour	N/A
07-098	TRUCK FIL	BULK POWDER TRUCK LOADING STATION #1	None	Filter	7.5 tons/hour	N/A
07-099	SP2-BF	POT #2 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-100	SP3-BF	POT #3 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-101	L28ED	LINE 28 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-104	VPL-29	LINE 29 VACUUM PUMP	None	None	4.25 tons/hour	N/A
07-104	VPL-30	LINE 30 VACUUM PUMP	None	None	3.25 tons/hour	N/A
07-104	VPL-31	LINE 31 VACUUM PUMP	None	None	3.25 tons/hour	N/A
07-105	L29ED	LINE 29 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-106	L30ED	LINE 30 EXTRUDER AND DIE VENT	None	None	3.25 tons/hour	N/A
07-107	L31ED	LINE 31 EXTRUDER AND DIE VENT	None	None	3.25 tons/hour	N/A
07-108	L-29 RH	LINE #29 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-109	L-30 RH	LINE #30 ROOF HOPPER BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-110	L-31 RH	LINE #31 ROOF HOPPER BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-115	CVSA	CENTRAL VACUUM SYSTEM A BAG HOUSE	None	Filter	1.25 tons/hour	N/A
07-116	CVSB	CENTRAL VACUUM SYSTEM B BAG HOUSE	None	Filter	1.25 tons/hour	N/A
07-117	REC FIL G	RECYCLE BAG HOUSE BLOWER G	None	Filter	8.35 tons/hour	N/A
07-119	SAVS	PAD VACUUM BAG HOUSE	None	Filter	0.25 tons/hour	N/A
07-120	DC-6	CPF ROOF HOPPERS BAG HOUSE (C1, C2, C7 & C10)	None	Cartridge Filter and Cyclones	1.5 tons/hour	N/A
07-121	20-S-C9-02	LINES C7, C20 & C22 ROTOCLONE	None	None	7.2 tons/hour	N/A
07-122	10-S-10NPI	C3, C5 NPI EXTRUDER FEED HOPPERS	None	Filter	0.9 tons/hour	N/A
07-123	C14/16 ROT	LINES C14/16 BLENDER ROTOCLONE	None	None	3.75 tons/hour	N/A
07-126	LC2D	LINE C2 EXTRUDER AND DIE VENT	None	None	0.7 tons/hour	N/A
07-127	LC1D	LINE C1 & C3 EXTRUDER AND DIE VENT	None	None	0.9 tons/hour	N/A
07-127	LC3D	LINE C3 EXTRUDER AND DIE VENT	None	None	0.9 tons/hour	N/A
07-128	LC7D	LINE C7 EXTRUDER AND DIE VENT	None	None	0.45 tons/hour	N/A
07-130	LC14D	LINE C14 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-131	LC14V	LINE C14 CPF VACUUM	None	None	1.25 tons/hour	N/A
07-131	LC16V	LINE C16 CPF VACUUM	None	None	2.5 tons/hour	N/A
07-131	LC18V	LINE C18 CPF VACUUM	None	None	2.5 tons/hour	N/A
07-132	WCV	CPF CENTRAL VACUUM SYSTEM BAG HOUSES	None	None	1.25 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-134	20-M-C1-01	CPF ROTOCLONE SYSTEM FOR BLENDER C1	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C10-1	CPF ROTOCLONE SYSTEM FOR BLENDER C10	None	CPF ES ROT	less than 100 lb/hr	N/A
07-134	20-M-C2-01	CPF ROTOCLONE SYSTEM FOR BLENDER C2	None	CPF ES ROT	less than 100 lb/hr	N/A
07-134	20-M-C3-01	CPF ROTOCLONE SYSTEM FOR BLENDER C3	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C7-01	CPF ROTOCLONE SYSTEM FOR BLENDER C7	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C8-01	CPF ROTOCLONE SYSTEM FOR BLENDER C8	None	CPF ES ROT	less than 100 lb/hr	N/A
07-135	VTBC14	LINE C14 & C16 VACUUM RECEIVER BLOWER	None	Filter	3.75 tons/hour	N/A
07-136	CMM1	CPF MOLDING MACHINE #1	None	None	less than 100 lb/hr	N/A
07-136	CMM2	CPF MOLDING MACHINE #2	None	None	less than 100 lb/hr	N/A
07-136	CMM3	CPF MOLDING MACHINE #3	None	None	less than 100 lb/hr	N/A
07-137	BVC1	LINES C1 & C7 VACUUM VENT	None	None	0.75 tons/hour	N/A
07-137	BVC3	CPF BARREL VACUUM VENT C3	None	None	0.3 tons/hour	N/A
07-137	BVC5	CPF BARREL VACUUM VENT C5	None	None	0.45 tons/hour	N/A
07-137	BVC7	CPF BARREL VACUUM VENT C7	None	None	0.45 tons/hour	N/A
07-139	BVC2	CPF BARREL VACUUM VENT C2	None	None	0.7 tons/hour	N/A
07-150	L-14PPC	LINE #14 PPC ROOF HOPPER BAG HOUSE	None	Filter	1.5 tons/hour	N/A
07-153	VDCS	BINS 51-56 AND K & L VERT DUST COLLECTOR	None	None	12.5 tons/hour	N/A
07-154	FGHJ VDC	F, G, H & J VERT DUST COLLECTOR	None	None	12.5 tons/hour	N/A
07-159	LC16D	LINE C16 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-159	LC18D	LINE C18 DIE VENT	None	None	2.5 tons/hour	N/A
07-161	SS1 BV	CO581 SAN SILO BAG HOUSE	None	Filter	1.35 tons/hour	N/A
07-162	SAN-RH	CO581 SAN ROOF HOPPER RECEIVER	None	Filter	1.35 tons/hour	N/A
07-163	ASC HCF	LINE 23, 24 & 25 ACRYLO SAN CO556 HOPPER CARTRIDGE FILTER	None	Filter	0.75 tons/hour	N/A
07-164	L23/24 SH	CO581 SAN ROOF HOPPER CARTRIDGE FILTER	None	Filter	1.35 tons/hour	N/A
07-166	HRG UL DC	SAN & HRG UNLOADING RECEIVER	None	Filter	3.5 tons/hour	N/A
07-167	HRG S1C	C29292 HRG SILO RECEIVER	None	Filter	2 tons/hour	N/A
07-168	HRG S2C	C29170 HRG SILO RECEIVER	None	Filter	2 tons/hour	N/A
07-169	HRG SILO 1	C29292 HRG SILO CONSERVATION VENT	None	None	2 tons/hour	N/A
07-170	HRG SILO 2	C29170 HRG SILO CONSERVATION VENT	None	None	2 tons/hour	N/A
07-171	HRG S1 DRV	C29292 HRG SILO ROTARY VALVE VENT	None	None	2 tons/hour	N/A
07-172	HRG S2 DRV	C29170 HRG SILO ROTARY VALVE VENT	None	None	2 tons/hour	N/A
07-173	HRG L23/24	LINES 23 & 24 HRG ROOF HOPPER RECEIVER	None	Filter	2.1 tons/hour	N/A
07-175	HRG 23/241	LINES 23 & 24 HRG ROOF HOPPER CONSERVATION VENT	None	N/A	2.1 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-176	HRG 23/242	LINES 23 & 24 HRG ROOF HOPPER CONSERVATION VENT	None	N/A	2.1 tons/hour	N/A
07-177	RDPST	RDP STORAGE TANK	None	None	N/A	N/A
07-180	RL23	LINE 23 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	1.25 tons/hour	N/A
07-182	RL24	LINE 24 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-183	L30AF-BV	L30 ADDITIVE FEEDER BIN	None	L30 ROTO	less than 100 lb/hr	N/A
07-183	L30FT BV	CART. FILTER 13-PA037	None	L30 ROTO	less than 100 lb/hr	N/A
07-185	C3EVP	LINE C3 VACUUM VENT	None	None	0.3 tons/hour	N/A
07-186	C5EVP	LINE C5 VACUUM VENT	None	None	0.45 tons/hour	N/A
07-192	RPDH	BROWN BAG POWDER BAGGING DUST COLLECTOR	None	Filter	0.65 tons/hour	N/A
07-194	RGT/CRG	REGRINDER C, D & E AND METAL DETECTION BAG HOUSE	None	Filter	25 tons/hour	N/A
07-195	CMH	COLOR MATCHING HOPPER BAG HOUSE	None	Filter	less than 100 lb/hr	N/A
07-197	BCB	STARTUP/RECYCLE DUST COLLECTOR SPARE BLOWER	None	Filter	6 tons/hour	N/A
07-199	L25/26XTH	LINES 25 & 26 XT HOPPER	None	Filter	4.5 tons/hour	N/A
07-200	L30/31B2RH	LINE #30 & 31 ROOF HOPPER #2 BAG HOUSE	None	Filter	6.5 tons/hour	N/A
07-201	L28/29B2RH	LINE #28 & 29 ROOF HOPPER #2 BAG HOUSE	None	Filter	8.5 tons/hour	N/A
07-202	L30CDC	LINE 30 STARTUP/RECYCLE BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-204	10-S-06	CPF RESIN BINS 1 THRU 5 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-205	VTBC16	LINE C16 & C18 VACUUM RECEIVER	None	Filter	6 tons/hour	N/A
07-206	BF-BPTL	BULK POWDER TRUCK LOADING STATION #2	None	None	12.5 tons/hour	N/A
07-207	MM1	MOLDING MACHINES 7, 8 & 9	None	None	less than 100 lb/hr	N/A
07-208	EXT7	MOLDING MACHINE #10. MINI EXTRUDERS #7 & #8.	None	None	less than 100 lb/hr	N/A
07-208	EXT8	EXTRUDER 10 LAB SCALE EXTRUDER	None	None	less than 100 lb/hr	N/A
07-250	DC0101F	LINE 25 HRG ROOF HOPPER CONSERVATION VENT	None	None	0.83 tons/hour	N/A
07-251	L25MH	LINES 23, 24 & 25 SAN C8707 ROOF HOPPER CARTRIDGE FILTER	None	Filter	1.66 tons/hour	N/A
07-252	SGH	LINES 23, 24 & 25 SAN GEL HOPPER CARTRIDGE FILTER	None	Filter	1.66 tons/hour	N/A
07-255	L25RH	LINE 25 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-256	HSH1	LINE 25 ROTOCLONE	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	HSH2	L25 CONCENTRATE FEEDER	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	L25 FTC	L25 FEED THROAT HOPPER V-05-01	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	L25 HF	L25 HRG FEEDER LW-04-04	None	L25 HRG FC L25 ROTO	less than 100 lb/hr	N/A
07-264	L25-HRG2	LINE 25 HRG ROOF HOPPER CONSERVATION VENT	None	None	0.83 tons/hour	N/A
07-266	C20-DHV	LINE C20 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-267	C20VP-Z5/7	LINE C20 VACUUM VENT	None	None	2.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-268	C20VACTB	LINES C20 & C22 RESIN RECEIVER BAG HOUSE	None	Filter	6.75 tons/hour	N/A
07-270	BSANSBV	C29355 SAN SILO CONSERVATION VENT	None	None	6.75 tons/hour	N/A
07-271	BSANSILODC	C29355 SAN SILO RECEIVER	None	Filter	6.75 tons/hour	N/A
07-272	BSAN-HV	C29355 SAN ROOF HOPPER CONSERVATION VENT	None	None	6.75 tons/hour	N/A
07-273	BSAN-HDC	C29355 SAN ROOF HOPPER RECEIVER	None	None	6.75 tons/hour	N/A
07-274	HRGL25DC	LINE 25 ROOF HOPPER RECEIVER	None	None	2.75 tons/hour	N/A
07-275	L23-25SHV	C29355 SAN SILO ROTARY VALVE VENT FILTER	None	None	6.75 tons/hour	N/A
07-276	CPF OQ	CPF OQ ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-277	C22 OQ	LINE C22 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-278	C22 OQ SS	LINE C22 SUPER SACK FILLING STATION	None	None	4.25 tons/hour	N/A
07-279	L27-29FV	LINES 27, 28 & 29 FEEDER ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-280	LC22VAC	LINE C22 VACUUM VENT	None	None	4.25 tons/hour	N/A
07-281	LC22R	LINE C22 ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-282	PB2-RHB	POWDER BAGGER #2 ROOF HOPPER BAGHOUSE	None	Filter	8.33 tons/hour	N/A
07-283	KM330DSR	KM330 DUMP STATION ROTOCLONE (LINES 12, 14, 15, 20 & 30)	None	ROTO	less than 100 lb/hr	N/A
07-286	L10-17RSYS	LINES 10 THRU 17 & C16 BULK HOPPER #1 ROTOCLONE SYSTEM	None	ROTO	less than 100 lb/hr	N/A
07-287	LC14RHVRB	LINE C14 ROOF HOPPER VACUUM RECEIVER BLOWER	None	Filter	6 tons/hour	N/A
07-289	L23/24SHCF	LINES 23 & 24 SAN GEL C0896 HOPPER CARTRIDGE FILTER	None	Filter	0.4 tons/hour	N/A
07-290	L27H2CF	LINE 27 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-292	L28SRUVH	LINE 28 STARTUP/RECYCLE UV HOPPER CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-293	L28SRNUVH	LINE 28 STARTUP/RECYCLE NON-UV HOPPER CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-295	L10BH1CF	LINE #10 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.25 tons/hour	N/A
07-296	L11BH1CF	LINE #11 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-297	L11BH2CF	LINE #11 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-298	L14BH2	LINE #14 BULK HOPPER #2 BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-299	L10/11BHR	LINE #10 & 11 BULK HOPPERS RECEIVER	None	Filter	3 tons/hour	N/A
07-300	L14BH2CF	LINE #14 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.5 tons/hour	N/A
07-301	LC7BH1CF	LINE C7 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	0.45 tons/hour	N/A
07-302	LC7BH2CF	LINE C7 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	0.45 tons/hour	N/A
07-304	L25BH2CF	LINE #25 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-305	L21BH2CF	LINE #21 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	2.5 tons/hour	N/A
07-306	L20BH1CF	LINE #20 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-307	S71TSDC	SILO 71 TRANSFER SYSTEM DUST COLLECTOR	None	None	32.5 tons/hour	N/A
07-308	S67TSDC	SILO 67 TRANSFER SYSTEM DUST COLLECTOR	None	None	32.5 tons/hour	N/A
07-309	L30SR754H1	LINE 30 STARTUP/RECYCLE 754 HOPPER 1	None	Filter	3.25 tons/hour	N/A
07-310	L30SR754H2	LINE 30 STARTUP/RECYCLE 701 HOPPER 2	None	Filter	3.25 tons/hour	N/A
07-332	BTLS1SV	BULK TRUCK LOADING STATION #1 SILO VENT	None	None	7.5 tons/hour	N/A
07-349	S/R DC SB	STARTUP/RECYCLE DUST COLLECTOR SPARE BLOWER	None	Filter	6 tons/hour	N/A
07-350	SILO SH1	RESIN SILO SHEET 1	None	Filter	12.5 tons/hour	N/A
07-351	SILO SH3	RESIN SILO SHEET 3	None	Filter	12.5 tons/hour	N/A
07-357	ROTOCL	L30-31 CARBON BLACK ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-352	SILO 72	RESIN SILO 72	None	Filter	25 tons/hour	N/A
07-353	10FD-C2-03	C2 BIN VENT A	None	Filter	0.5 tons/hour	N/A
07-354	10FD-C2-04	C2 BIN VENT B	None	Filter	0.5 tons/hour	N/A
07-355	10FDS73-01	SILO 73 BIN VENT	None	Filter	20 tons/hour	N/A
07-358	R SILO 74	RESIN SILO 74 BIN VENT	None	Filter	35.00 tons/hour	N/A
07-359	S74DTDCEB	SILO 74 DIRECT TRANSFER DUST COLLECTOR EXHAUST BLOWER	None	Filter	0.5 tons/hour	N/A
07-360	10-GB-BL-0	SILO 74 TRUCK 1 LOADING COLLECTOR EXHAUST BLOWER	None	Filter	1.00 tons/hour	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

A.10 Boilerhouse I [Section K]

A.10.1 Boilerhouse I

Boilerhouse I Affected Facilities/Sources

(a) [Reserved]

BH I Boilers

(b) The boilers located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum heat input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit[d][e]	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001	BW-BOILER	B&W BOILER natural gas with/without supplemental hydrogen	None	None	173 MMBtu/hr	1975
09-002	E BOILER	ERIE BOILER coal fired	BHI Baghouse	None	249 MMBtu/hr	1975
09-002	L BOILER	LASKER BOILER coal fired	BHI Baghouse	None	128.7 MMBtu/hr (design)	1962
09-002	V BOILER	VOGT BOILER coal fired	BHI Baghouse	None	51.3 MMBtu/hr (design)	1959
09-106	R BOILER	RILEY BOILER natural gas fired	None	None	178.5 MMBtu/hr	1969

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) E Boiler, L Boiler, BW-Boiler, and R Boiler may be used for controlling organic sulfides from the COS stream. The COS stream is the regeneration gas stream created by carbon adsorbers used in the carbon monoxide generation/purification process; carbon monoxide is used in the LEXAN# production facility. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide. In addition to having the option to use the Erie Boiler, Lasker Boiler, B&W Boiler, or Riley Boiler for controlling these organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either an oxidizer (08-706) or flare (08-707). The oxidizer and flare are described in Section I of this permit. The flare (08-707) serves only as back-up to the oxidizer (08-706) and during safety interlock of the system.
(e) E Boiler, BW-Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream. The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S4 and S5. The SHEETFUMES stream may be vented to either the E Boiler or R Boiler for control.

BH I Storage and Heat Exchange Operations

(c) The storage and heat exchange operations located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-003	NO.6 ST TK	NO.6 FUEL OIL STORAGE TANK	None	None	1,514 m^3	N/A
09-004	GSTA	UNLEADED GASOLINE STORAGE TANK VH-1	None	None	3.81 m^3	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
09-005	GST(L)	DIESEL-R STORAGE TANK VH-2	None	None	2.18 m^3	N/A
09-009	DST	DIESEL STORAGE TANK VH-3	None	None	2.13 m^3	N/A
09-100	F-CVCS-BH1	CENTRAL VACUUM SYSTEM	None	None	0.175 tons/hour	N/A
09-101	BH1 CTC1	COOLING TOWER #1 CELL A	None	None	N/A	N/A
09-102	BH1 CTC2	COOLING TOWER #1 CELL B	None	None	N/A	N/A
09-103	BH1 CTC3	COOLING TOWER #1 CELL C	None	None	N/A	N/A
09-104	BH1 CTC4	COOLING TOWER #1 CELL D	None	None	N/A	N/A
09-105	BH1 CTC5	COOLING TOWER #1 CELL E	None	None	N/A	N/A
09-107	PRV-TS	PRV TEST STAND	None	None	N/A	N/A
09-111	MG CTC3	COOLING TOWER CELL 3	None	None	N/A	N/A
09-112	GST VH4	UNLEADED GASOLINE TANK VH4	None	None	2.13 m^3	N/A
09-113	DST VH5	DIESEL STORAGE TANK VH5	None	None	2.13 m^3	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

A.11 Structured Products [Section L]

A.11.1 Structured Products, Building 4

Structured Products Affected Facilities/Sources

(a) Sp-PPPC is the affected source pursuant to 40 CFR 63, Subpart PPPP - National Emission Standards for Hazardous Air Pollutants: Surface Coating of Plastic Parts and Products. In accordance with 40 CFR 63, Subpart PPPP, the following emissions units comprise the affected source, identified as Sp-PPPC, that is subject to 40 CFR 63, Subpart PPPP:

(1) All coating operations as defined in 40 CFR 63.4581 (plastic coating lines identified in Section L.2 of this permit as C-41 and C-42 are included in this affected source);
(2) All storage containers and mixing vessels in which coatings, thinners and/or other additives, and cleaning materials are stored or mixed;
(3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and
(4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation.

(b) Sp-POWC is the affected source pursuant to 40 CFR 63, Subpart JJJJ – National Emission Standards for Hazardous Air Pollutants: Paper and Other Web Coating. The affected source, identified as Sp-POWC, comprises all web coating lines, as set forth in 40 CFR 63.3300. Web, as defined in 40 CFR 63.3310 means a continuous substrate which is flexible enough to be wound or unwound as rolls. Web coating lines identified in Section L.2 of this permit as S-4, S-5, and C-6, and film coating line identified as C-45, C7A, C7B, and C8 are included in this affected source.

Structured Products Operations

(c) The Structured Products operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description;

the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001; 09-002; and 09-106	SHEETFUMES*	COATING LINES - C-41, C-42, S-4, S-5	Boilers in Section K	None	N/A	N/A
10-086	OSFCA	C-45 FILM COATER	None	None	N/A	N/A
10-087	OSFCB		None	None	N/A	N/A
10-199	C42FMR	C-42 FMR COOLING ZONE	None	None	N/A	N/A
10-358	C7A	C7A PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-359	C7B	C7B PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-360	C8	C8 PLASTIC FILM WEB COATING LINE	None	None	N/A	2006
10-361	C-6	C-6 COATING LINE	None	None	N/A	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
10-010	EDV S5	EXTRUDER & DIE VENT S-5	None	None	1.70 tons/hour	N/A
10-011	EHV S4	EXTRUDER & DIE VENT S-4	None	None	1.23 tons/hour	N/A
10-012	EHV S3	EXTRUDER HEATER VENT S-3	None	None	0.33 tons/hour	N/A
10-013	EHV S1	EXTRUDER HEATER VENT S-1	None	None	0.20 tons/hour	N/A
10-014	PDH86	PELLET DRYING HOPPER 86	None	None	1.60 tons/hour	N/A
10-015	PDH85	PELLET DRYING HOPPER 85	None	None	1.60 tons/hour	N/A
10-016	PDH84	PELLET DRYING HOPPER 84	None	None	1.60 tons/hour	N/A
10-017	PDH83	PELLET DRYING HOPPER 83	None	None	1.60 tons/hour	N/A
10-018	PDH82	PELLET DRYING HOPPER 82	None	None	1.60 tons/hour	N/A
10-019	PDH81	PELLET DRYING HOPPER 81	None	None	1.60 tons/hour	N/A
10-020	PDH76	PELLET DRYING HOPPER 76	None	None	1.23 tons/hour	N/A
10-021	PDH75	PELLET DRYING HOPPER 75	None	None	1.23 tons/hour	N/A
10-022	PDH74	PELLET DRYING HOPPER 74	None	None	1.23 tons/hour	N/A
10-023	PDH73	PELLET DRYING HOPPER 73	None	None	1.23 tons/hour	N/A
10-024	PDH72	PELLET DRYING HOPPER 72	None	None	1.23 tons/hour	N/A
10-025	PDH71	PELLET DRYING HOPPER 71	None	None	1.23 tons/hour	N/A
10-026	PDH43	PELLET DRYING HOPPER 43	None	None	1.23 tons/hour	N/A
10-027	PDH45	PELLET DRYING HOPPER 45	None	None	1.23 tons/hour	N/A
10-028	PDH44	PELLET DRYING HOPPER 44	None	None	1.23 tons/hour	N/A
10-029	PDH42	PELLET DRYING HOPPER 42	None	None	1.23 tons/hour	N/A
10-030	PDH46	PELLET DRYING HOPPER 46	None	None	1.23 tons/hour	N/A
10-031	PDH41	PELLET DRYING HOPPER 41	None	None	1.23 tons/hour	N/A
10-032	PDH53	PELLET DRYING HOPPER 53	None	None	1.70 tons/hour	N/A
10-033	PDH51	PELLET DRYING HOPPER 51	None	None	1.70 tons/hour	N/A
10-034	PDH52	PELLET DRYING HOPPER 52	None	None	1.70 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
10-035	PDH37	PELLET DRYING HOPPER 37	None	None	0.33 tons/hour	N/A
10-036	PDH35	PELLET DRYING HOPPER 35	None	None	0.33 tons/hour	N/A
10-037	PDH36	PELLET DRYING HOPPER 36	None	None	0.33 tons/hour	N/A
10-038	PDH34	PELLET DRYING HOPPER 34	None	None	0.33 tons/hour	N/A
10-039	PDH31	PELLET DRYING HOPPER 31	None	None	0.33 tons/hour	N/A
10-040	PDH33	PELLET DRYING HOPPER 33	None	None	0.33 tons/hour	N/A
10-041	PDH32	PELLET DRYING HOPPER 32	None	None	0.33 tons/hour	N/A
10-042	PDH14	PELLET DRYING HOPPER 14	None	None	0.33 tons/hour	N/A
10-043	PDH13	PELLET DRYING HOPPER 13	None	None	0.55 tons/hour	N/A
10-044	PDH12	PELLET DRYING HOPPER 12	None	None	0.55 tons/hour	N/A
10-045	PDH11	PELLET DRYING HOPPER 11	None	None	0.55 tons/hour	N/A
10-046	PDH65	PELLET DRYING HOPPER 65	None	None	0.55 tons/hour	N/A
10-047	PDH64	PELLET DRYING HOPPER 64	None	None	0.55 tons/hour	N/A
10-048	PDH63	PELLET DRYING HOPPER 63	None	None	0.55 tons/hour	N/A
10-049	DHE (S8)	DIE HEAD EXHAUST S-8/S-1	None	None	1.60 tons/hour	N/A
10-054	EDHE (S6)	EXTRUDER & DIE HEAD EXHAUST S-6	None	None	0.55 tons/hour	N/A
10-055	DHE (S10)	DIE HEAD EXHAUST S10	None	None	0.55 tons/hour	N/A
10-055	DHE (S2)	DIE HEAD EXHAUST S-2	None	None	0.20 tons/hour	N/A
10-056	PDH62	PELLET DRYING HOPPER 62	None	None	0.55 tons/hour	N/A
10-057	PDH61	PELLET DRYING HOPPER 61	None	None	0.55 tons/hour	N/A
10-077	PED	PROFILE EXTRUDER & DIE	None	None	0.50 tons/hour	N/A
10-078	PDH161	PROFILE PELLET DRYING HOPPER 161	None	None	0.50 tons/hour	N/A
10-079	PDH162	PROFILE PELLET DRYING HOPPER 162	None	None	0.50 tons/hour	N/A
10-080	PDH163	PROFILE PELLET DRYING HOPPER 163	None	None	0.50 tons/hour	N/A
10-081	PDH164	PROFILE PELLET DRYING HOPPER 164	None	None	0.50 tons/hour	N/A
10-082	PDH165	PROFILE PELLET DRYING HOPPER 165	None	None	0.50 tons/hour	N/A
10-083	PDH166	PROFILE PELLET DRYING HOPPER 166	None	None	0.50 tons/hour	N/A
10-097	CAVP-097	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-098	CAVP-098	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-099	QCSB	QC SPRAY BOOTH	None	None	Less Than 100 lb/hr	N/A
10-100	QABH	QA BURN HOOD	None	None	Less Than 100 lb/hr	N/A
10-101	QA01	QC OVEN 1	None	None	N/A	N/A
10-105	DCE	DIE CLEAN EXHAUST	None	None	N/A	N/A
10-106	S1 BLOWER	SCALE 1 BLOWER	None	Filter	5.43 tons/hour	N/A
10-107	S2 BLOWER	SCALE 2 BLOWER	None	Filter	5.43 tons/hour	N/A
10-108	S3 BLOWER	SCALE 3 BLOWER	None	Filter	5.43 tons/hour	N/A
10-112	PDH51N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-113	PDH52N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-114	PDH53N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-115	CAVP-115	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-116	CAVP-116	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-117	CAVP-117	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-118	CAVP-118	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-120	PDH131	PELLET DRYING HOPPER 131	None	None	0.78 tons/hour	N/A
10-121	PDH132	PELLET DRYING HOPPER 132	None	None	0.78 tons/hour	N/A
10-122	PDH133	PELLET DRYING HOPPER 133	None	None	0.78 tons/hour	N/A
10-123	PDH134	PELLET DRYING HOPPER 134	None	None	0.78 tons/hour	N/A
10-124	PDH135	PELLET DRYING HOPPER 135	None	None	0.78 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
10-125	CAVP-125	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-126	CAVP-126	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-127	T13ED	EXTRUDER/DIE EXHAUST	None	None	0.46 tons/hour	N/A
10-128	CAVP-128	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-129	CAVP-129	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-130	CAVP-130	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-131	CAVP-131	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-134	PDH1413	PELLET DRYING HOPPER 1413	None	None	1.23 tons/hour	N/A
10-135	PDH1414	PELLET DRYING HOPPER 1414	None	None	1.23 tons/hour	N/A
10-136	PDH1411	PELLET DRYING HOPPER 1411	None	None	1.23 tons/hour	N/A
10-136	PDH1421	PELLET DRYING HOPPER 1421	None	None	1.23 tons/hour	N/A
10-136	PDH1431	PELLET DRYING HOPPER 1431	None	None	1.23 tons/hour	N/A
10-137	PDH1412	PELLET DRYING HOPPER 1412	None	None	1.23 tons/hour	N/A
10-137	PDH1432	PELLET DRYING HOPPER 1432	None	None	1.23 tons/hour	N/A
10-138	PDH1441	PELLET DRYING HOPPER 1441	None	None	1.23 tons/hour	N/A
10-138	PDH1451	PELLET DRYING HOPPER 1451	None	None	1.23 tons/hour	N/A
10-138	PDH1461	PELLET DRYING HOPPER 1461	None	None	1.23 tons/hour	N/A
10-139	PDH1442	PELLET DRYING HOPPER 1442	None	None	1.23 tons/hour	N/A
10-139	PDH1452	PELLET DRYING HOPPER 1452	None	None	1.23 tons/hour	N/A
10-139	PDH1462	PELLET DRYING HOPPER 1462	None	None	1.23 tons/hour	N/A
10-146	F14ED	F14 EXTRUDER & DIE	None	None	1.23 tons/hour	N/A
10-147	GS8-BH	GRINDER TRANSFER BLOWER	None	Filter	0.12 tons/hour	N/A
10-148	G2	GRINDER 2	None	None	0.12 tons/hour	N/A
10-149	G1	GRINDER	None	None	0.06 tons/hour	N/A
10-150	G3	GRINDER 3	None	None	0.12 tons/hour	N/A
10-150	G4	GRINDER 4	None	None	0.12 tons/hour	N/A
10-152	F12ED	F12 EXTRUDER & DIE	None	None	0.70 tons/hour	N/A
10-153	PDH121	PELLET DRYING HOPPER 121	None	None	0.70 tons/hour	N/A
10-154	PDH122	PELLET DRYING HOPPER 122	None	None	0.70 tons/hour	N/A
10-155	PDH123	PELLET DRYING HOPPER 123	None	None	0.70 tons/hour	N/A
10-156	PDH124	PELLET DRYING HOPPER 124	None	None	0.70 tons/hour	N/A
10-157	CAVP-157	CONAIR VACUUM PUMP	None	None	1.50 tons/hour	N/A
10-158	CAVP-158	CONAIR VACUUM PUMP	None	None	1.50 tons/hour	N/A
10-159	PDH111	PELLET DRYING HOPPER 111	None	None	0.55 tons/hour	N/A
10-160	PDH112	PELLET DRYING HOPPER 112	None	None	0.55 tons/hour	N/A
10-161	CAVP-161	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-162	TC (A)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-168	TC(B)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-171	AIR ELIM A	RECOVERY DEVICE	None	None	Less Than 100 lb/hr	N/A
10-172	AIR ELIM B	RECOVERY DEVICE	None	None	Less Than 100 lb/hr	N/A
10-178	KE	R&D SPRAY BOOTH - HWR	None	None	Less Than 100 lb/hr	N/A
10-179	R&D CCRC	R&D COLD CAST ROLL COATER, UV CURE AND EXTRUDER	None	None	Less Than 100 lb/hr	N/A
10-180	RRC&C	REVERSE ROLL COATER & CURE	None	None	1.60 tons/hour	N/A
10-181	SILO 1 BV	BAGHOUSE SILO 1	None	Filter	5.43 tons/hour	N/A
10-182	SILO 2 BV	BAGHOUSE SILO 2	None	Filter	5.43 tons/hour	N/A
10-183	SILO 3 BV	BAGHOUSE SILO 3	None	Filter	5.43 tons/hour	N/A
10-184	LPS BLOWER	LPS BIN VENT BLOWER	None	None	0.50 tons/hour	N/A
10-185	F14 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.23 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
10-186	S4 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.20 tons/hour	N/A
10-187	S5 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.75 tons/hour	N/A
10-189	DHE UCFL	DIE HOOD EXHAUST - ULTEM# CAST FILM LINE	None	None	0.20 tons/hour	N/A
10-191	PDH 1701	PELLET DRYING HOPPER 1701	None	None	0.20 tons/hour	N/A
10-192	PDH 1702	PELLET DRYING HOPPER 1702	None	None	0.20 tons/hour	N/A
10-193	PDH1703	PELLET DRYING HOPPER 1703	None	None	0.20 tons/hour	N/A
10-194	PDH1704	PELLET DRYING HOPPER 1704	None	None	0.20 tons/hour	N/A
10-195	CAVP-195	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-196	CAVP-196	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-200	FLH	FINISHING LAB HOOD	None	None	N/A	N/A
10-202	HWL-KL51	R&D HOOD WET LAB	None	None	N/A	N/A
10-203	HWL-KL52	R&D HOOD WET LAB	None	None	N/A	N/A
10-204	HWL-LM51	R&D HOOD WET LAB	None	None	N/A	N/A
10-205	HWL-LM52	R&D HOOD WET LAB	None	None	N/A	N/A
10-206	OWL-L3	R&D OVEN WET LAB	None	None	N/A	N/A
10-207	OWL-LM31	R&D OVEN WET LAB	None	None	N/A	N/A
10-208	OWL-LM32	R&D OVEN WET LAB	None	None	N/A	N/A
10-300	PDH113	PELLET DRYING HOPPER 113	None	None	0.55 tons/hour	N/A
10-301	PDH114	PELLET DRYING HOPPER 114	None	None	0.55 tons/hour	N/A
10-302	PDH91	PELLET DRYING HOPPER 91	None	None	0.55 tons/hour	N/A
10-302	PDH92	PELLET DRYING HOPPER 92	None	None	0.55 tons/hour	N/A
10-303	PDH93	PELLET DRYING HOPPER 93	None	None	0.55 tons/hour	N/A
10-303	PDH94	PELLET DRYING HOPPER 94	None	None	0.55 tons/hour	N/A
10-304	PDH20	PELLET DRYING HOPPER 20	None	None	0.20 tons/hour	N/A
10-304	PDH21	PELLET DRYING HOPPER 21	None	None	0.20 tons/hour	N/A
10-304	PDH22	PELLET DRYING HOPPER 22	None	None	0.20 tons/hour	N/A
10-304	PDH23	PELLET DRYING HOPPER 23	None	None	0.20 tons/hour	N/A
10-305	PDH101	PELLET DRYING HOPPER 101	None	None	0.55 tons/hour	N/A
10-305	PDH104	PELET DRYING HOPPER 104	None	None	0.55 tons/hour	N/A
10-306	PDH102	PELLET DRYING HOPPER 102	None	None	0.55 tons/hour	N/A
10-306	PDH103	PELLET DRYING HOPPER 103	None	None	0.55 tons/hour	N/A
10-307	PDH 54N	PELLET DRYING HOPPER 54 NEW	None	None	1.70 tons/hour	N/A
10-308	PDH55N	PELLET DRYING HOPPER 55 NEW	None	None	1.70 tons/hour	N/A
10-309	PDH56N	PELLET DRYING HOPPER 56 NEW	None	None	1.70 tons/hour	N/A
10-310	CAVP-310	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-311	CAVP-311	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-312	CAVP-312	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-313	CAVP-313	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-314	CAVP-314	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-315	CAVP-315	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-316	CAVP-316	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-317	CAVP-317	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-318	CAVP-318	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-319	CAVP-319	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-320	CAVP-320	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-321	CAVP-321	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-322	CAVP-322	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-323	CAVP-323	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-324	CAVP-324	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-325	CAVP-325	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-326	CAVP-326	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
10-327	CAVP-327	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-328	CAVP-328	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-329	CAVP-329	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-330	CAVP-330	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-331	CAVP-331	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-332	CAVP-332	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-333	SB24	SURGE BIN 24	None	Filter	0.57 tons/hour	N/A
10-334	CAVP-334	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-335	CAVP-335	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-336	CAVP-336	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-337	CAVP-337	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-338	TC (C)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-339	F9DH	F9 DIE HOOD VENT	None	None	0.40 tons/hour	N/A
10-340	F-17 CYC	F-17 RECOVERY DEVICE	None	Cyclone	0.20 tons/hour	N/A
10-341	DHE (S1)	S1 DIE HEAD EXHAUST	None	None	0.55 tons/hour	N/A
10-342	MWS	MWS EXTRUDER AND DIE	None	None	0.50 tons/hour	N/A
10-343	CPVP1-4	CALIBRATOR PLATE VACUUM PUMPS	None	None	0.50 tons/hour	N/A
10-344	CPVP5-8	CALIBRATOR PLATE VACUUM PUMPS	None	None	0.50 tons/hour	N/A
10-345	MWSAO	MWS ANNEALLING OVEN	None	None	0.50 tons/hour	N/A
10-346	MWSCO	MWS CURE OVEN	None	None	0.50 tons/hour	N/A
10-347	F-903	FILTER RECEIVER	None	Filter	0.15 tons/hour	N/A
10-348	P3	P3 VACUUM PUMP SILOS 1 & 2	None	Filter	0.10 tons/hour	N/A
10-349	P4	P4 VACUUM PUMP SILOS 3 & 5	None	Filter	0.10 tons/hour	N/A
10-350	P5	P5 VACUUM PUMP SILOS 4 & 6	None	Filter	0.10 tons/hour	N/A
10-351	F908	F-908 FILTER RECEIVER	None	Filter	0.15 tons/hour	N/A
10-352	S-48	COATING ROOM LAB HOOD	None	None	N/A	N/A
10-353	MTLF18	CONAIR MATERIAL TRANSFER VENT LINE F-18	None	Filter	0.40 tons/hour	N/A
10-355	MTLF19	CONAIR MATERIAL TRANSFER VENT LINE F-19	None	Filter	0.40 tons/hour	N/A
10-356	F18BV	F-18 BARREL VENT	None	None	0.40 tons/hour	N/A
10-357	F19BV	F-19 BARREL VENT	None	None	0.40 tons/hour	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S-4, and S-5. The boilers described in Section K of this permit, E Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream.

Temporary Boiler

(d) The boiler listed below represents a temporary, portable steam generating unit for Structured Products. The stack/vent I.D.; emission unit I.D; emission unit description; maximum heat capacity; and date of construction are in the following table:

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Maximum Capacity	Date of Construct
10-500	TEMPBOILER	Small natural gas or No.2 fuel oil fired boiler	10.468 MMBtu/hr	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))

A.12 LEXAN# Development [Section M]

A.12.1 LEXAN# Development, Building 7

LEXAN# Development Operations

(a) The LDF operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
11-018	BFBPAH	RAW MATERIAL ADDITION V3011	None	Bag Filter	0.15 tons/hr	N/A
11-020	C-3041	VENTILATION SYSTEM BLOWER	None	None	N/A	N/A
11-025	V-9111	V-9111 REFRIGERATED WATER SYSTEM	None	None	N/A	N/A
11-027	C-8123	VENT GAS ABSORBER	None	Scrubber*	N/A	N/A
11-123	F-3313	F-3313 DUST COLLECTOR	None	Bag Filter	0.15 tons/hr	N/A
11-148	C-9014	DI HCL DRUM SCRUBBER	None	None	N/A	N/A
11-149	V-9811	DIESEL FUEL TANK	None	None	N/A	N/A
11-150	FDCS	FUGITIVE DUST COLLECTION SYSTEM	None	Bag Filter	less than 100 lbs/hr	N/A
11-151	LDF-OQEDV	LDF OQ EXTRUDER AND DIE VENT	None	Bag Filter	less than 100 lbs/hr	N/A
11-152	LDF-OQEDC	LDF OQ EXTRUDER DUST COLLECTOR	None	Bag Filter	less than 100 lbs/hr	N/A
11-153	V-3060	V-3060	None	Bagfilter	0.15 tons/hour	N/A
11-154	F-3017	K-TRON FEEDER	None	Bagfilter	0.15 tons/hour	N/A
11-155	F-3315	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-156	F-3316	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-157	F-3317	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-158	F-6010	BPA UNLOADING SYSTEM	None	Bagfilter	0.15 tons/hour	N/A
11-159	F-6011	BPA RECEIVER	None	Bagfilter	0.15 tons/hour	N/A

[a] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
[b] Equipment is integral to the process operation.

[(c)] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

* There are no regulatory requirements for this scrubber. This scrubber is part of the polycarbonate development process which processes methylene chloride which is not a VOC.

A.13 CPP Resin [Section N]

A.13.1 CPP Resin, Buildings 28, 34, and 60

CPP Resin Affected Facilities/Sources

(a) Plant-MON identifies the affected source subject to 40 CFR 63, Subpart FFFF. Plant-MON is the facility wide collection of MCPU's and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials specified in 40 CFR 63.2435(b)(1) that are not otherwise exempted from requirements of 40 CFR 63, Subpart FFFF. A MCPU includes equipment necessary to operate the miscellaneous organic chemical manufacturing process, as defined in 40 CFR 63.2550, and includes assigned storage tanks and product transfer racks, equipment in open systems that is used to convey or store water having the same concentration and flow characteristics as wastewater, and components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, and instrumentation systems that are used to manufacture any material or family of materials described in 40 CFR 63.245(b)(1)(i) through (v). MCPUs subject to 40 CFR 63, Subpart FFFF are identified below:

(1) CppMONRes3 identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces CPP Resin.

(2) HppMONCoP1, HppMON CoP2, HppMON CoP3, and HppMON CoP4, identify MCPUs, as specified in 40 CFR 63.2435(b), that produce HPP Co-Polymer and conduct solvent recovery. HppMONCoP1, HppMON CoP2, HppMON CoP3, and HppMON CoP4 are located in HPP Co-Polymer, Section P of this Part 70 Permit.

(3) HppMONMon1identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP monomer. HppMONMon1 is located in HPP ChemOps, Section Q of this Part 70 Permit.

(4) HppMONPol1identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP polymer. HppMONPol1 is located in HPP ChemOps, Section Q of this Part 70 Permit.

(5) PhMON_PCP identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the PCP. PhMON_PCP is located in the Phenol plant, Section E of this Part 70 Permit.

(b) The affected facility subject to 40 CFR 60, Subpart NNN is identified as CppC-310. The affected facility consists of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) CppVV is an affected facility in the CPP Process Unit subject to 40 CFR 60, Subpart VV. CppVV consists of components assembled to produce Methanol and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(d) [Reserved]

CPP Resin Process Operations

(e) The CPP Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-154	E-314*	V-310 MeOH STORAGE TANK (Note: V-310 is the C-310 distillation overheads receiver)	None	Condenser	N/A	Prior 1985
12-155	E-313	CONDENSER E-313	None	E-313 is recovery device	N/A	1983
12-169	H-390	H-390 HOT OIL HEATER CAPABLE OF BURNING NATURAL GAS AND OFF GAS	None	None	17.28 MMBtu/hr	1984

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-172	W370A/B	TRANSFER BINS W-370/A/B	None	None	13.75 tons/hr	N/A
12-230	DTL	BD TRUCK LOADING	None	None	N/A	N/A
12-247	PD-470A	PELLETIZER DRYER D-470A	None	None	3.44 tons/hr	N/A
12-247	PD-470B	PELLETIZER DRYER D-470B	None	None	3.44 tons/hr	N/A
12-251	E-602	THF UNLOADING FACILITY TANK V-600	None	None	N/A	N/A
12-356	PD-370A	PELLETIZER DRYER D-370A	None	None	3.44 tons/hr	N/A
12-356	PD-370B	PELLETIZER DRYER D-370B	None	None	3.44 tons/hr	N/A
12-357	VLX CTC1	VALOX COOLING TOWER CELL 1	None	None	N/A	N/A
12-358	VLX CTC2	VALOX COOLING TOWER CELL 2	None	None	N/A	N/A
12-359	H-370	DIE HEAD CLEANING OVEN H-370	None	None	N/A	N/A
12-561	V-496	V-496 RAIL CAR UNLOADING	None	None	N/A	N/A
12-586**	BOVEN	H-390 OFF GAS VENT	None	None	N/A	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))
* The distillation operation identified as C-310 is subject to NSPS requirements. C-310 vents through stack/vent 12-154, identified as emission unit E-314.

** S/V 12-586 is a stack that provides by-pass from H-390 for process safety purposes; 12-586 is normally not an active vent.

CPP Resin Area Tanks

(f) Tanks located in the CPP Resin Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
12-008	E-104A	MeOH STORAGE TANK T104A	None	Condenser	90.84 m^3	1973
12-112	E-104B	MeOH STORAGE TANK T104B	None	Condenser	113.5 m^3	1975
12-150	V-318	V-318 DOW G STORAGE TANK	None	None	4.1 m^3	1983
12-153	JKD 308	V-308 BD MeOH STORAGE TANK	None	Condenser	6.7 m^3	1984
N/A	T-1122	T-1122	None	None	100 m^3	1990
12-560	V-401	DMT TANK V-401	V301/401SC*	None	417 m^3	1988

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
12-003	TK-106	BD RECOVERY TANK T106	None	None	N/A	Prior to 1984
12-006	TK-102	BD STORAGE TANK T102	None	None	215 m^3	1973
12-114	E-1110	BD STORAGE TANK (T-1110)	None	None	193 m^3	1989
12-122	T-119	HOT OIL STORAGE TANK TK-119	None	None	37.9 m^3	N/A
12-148	V-303	V-303 BD STORAGE TANK	None	None	24 m^3	1984
12-149	V-304	V-304 BD STORAGE TANK	None	None	96 m^3	1984
12-152	V-307	V-307 BD STORAGE TANK	None	None	417 m^3	1984
12-156	E-322	V-320/E-322 BD MeOH STORAGE TANK	None	Condenser	3.3 m^3	1984
12-157	JKD PIPE	V330 BD MeOH STORAGE TANK	None	Condenser	3.3 m^3	1984
12-158	JACK PIPE	V-431 MeOH STORAGE TANK	None	Condenser	1.0 m^3	1988
12-159	V-340	V-340 BD STORAGE TANK	None	None	5.6 m^3	1984
12-160	V-450	V-450 BD STORAGE TANK	None	None	6.4 m^3	N/A
12-161	V-351	V-351 DOW A STORAGE TANK	None	None	3.5 m^3	1984
12-162	V-360	V-360 BD STORAGE TANK	None	None	6.4 m^3	1984
12-163	V-362	V-362 BD STORAGE TANK	None	None	3.5 m^3	1984
12-164	V-363	V-363 DOW G STORAGE TANK	None	None	2.0 m^3	N/A
12-165	V-364	V-364 MeOH STORAGE TANK	None	None	6.7 m^3	1984
12-166	V-390	V-390 DOW G STORAGE TANK	None	None	52 m^3	1984
12-168	V-392	V-392 DOW G STORAGE TANK	None	None	3.7 m^3	1984
12-229	V-460	V-460 BD STORAGE TANK	None	None	8.7 m^3	1988
12-560	V-301	DMT STORAGE TANK	V301/401SC*	None	N/A	N/A
12-359	V-302	DMT STORAGE TANK	None	None	17.1 m^3	1984
12-359	V-306	TPT STORAGE TANK	None	None	0.8 m^3	1984

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* Emissions from DMT storage tanks V-301, and V-401 are routed to the scrubber identified as V301/401SC.

CPP Resin Leak Detection and Repair (LDAR) Components

(g) LDAR applies to the collection of all equipment (as defined in 40 CFR 60.481) located in the CppVV affected facility. This equipment includes each pump, compressor, agitator, pressure relief device, sampling connection system, open-ended valve or line, valve, and flange or other connector that is in VOC service. In VOC service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 10 percent by weight of VOC. [40 CFR 60.481] For clarification purposes, CppVV equipment operates in methanol (VOC) service.

A.14 CPP Finishing [Section O]

A.14.1 CPP Finishing, Buildings 29 and 30

CPP Finishing Operations

(a) The CPP Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Insignificant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-039	CL2RH	CL2 RESIN HOPPER	None	None	0.5 tons/hour	N/A
12-042	V-506D	V-506 ELUTRIATOR DUST COLLECTOR	Filter	None	2 tons/hour	N/A
12-057	V-506	V506 RESIN HOPPER	None	None	2 tons/hour	N/A
12-072	SILO J	J RAW MATERIAL SYSTEM	None	Filter	1.5 tons/hour	N/A
12-073	SILO K	K RAW MATERIAL SYSTEM	None	Filter	1.5 tons/hour	N/A
12-137	L12RBF/A	L12 195 HOPPER	None	Filter	1.2 tons/hour	N/A
12-138	L12RBF/B	L12 315 HOPPER	None	Filter	1.2 tons/hour	N/A
12-142	L13RBF/A	L13 195 HOPPER	None	Filter	1.2 tons/hour	N/A
12-143	L13RBF/B	L13 315 HOPPER	None	Filter	1.2 tons/hour	N/A
12-145	L4CF	L4/12/13 CENTRAL COLLECTION SYSTEM	None	Filter	3.5 tons/hour	N/A
12-170	CSM	CHIP SILO M	None	None	5 tons/hour	N/A
12-171	CSN	CHIP SILO N	None	None	5 tons/hour	N/A
12-173	BCB (VLX)	BAG COLLECTOR BLOWER	None	Filter	5 tons/hour	N/A
12-181	CL4RBF/A	BAG FILTER 315	None	Filter	0.5 tons/hour	N/A
12-182	CL4RBF/B	BAG FILTER 195	None	Filter	0.5 tons/hour	N/A
12-185	L15RBF/A	V1501 L15 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-186	L15RBF/B	V1502 L15 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-189	L16RBF/A	V1601 L16 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-190	L16RBF/B	V1501T L16 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-193	L17RBF/A	V1701 L17 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
12-194	L17RBF/B	V1701 L17 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-195	FRSS	FR STORAGE SILO	None	Filter	less than 100 lbs/hr	N/A
12-196	FPRCS2	HOFFMAN BLOWER K-005	None	Filter	9 tons/hour	N/A
12-197	L14EFP	COMP-2 BLOWER K-003	None	Filter	less than 100 lbs/hr	N/A
12-201	L8LPSA	LEXAN# POWDER SILO A F812A	None	Filter	1.5 tons/hour	N/A
12-203	L8RBF/A	V915 LINE 8 195 VESSEL	None	Filter	2.5 tons/hour	N/A
12-204	L8RBF/B	V1515B LINE 8 315 VESSEL	None	Filter	2.5 tons/hour	N/A
12-205	L8LPF	L8 LEXAN# POWDER DAY BIN BAG FILTER A	None	Filter	1.5 tons/hour	N/A
12-206	L15-17	EXTRUDER FUME VENTILATION LINES 15-17 SOUTH	None	None	0.3465 tons/hour	N/A
12-207	FCDC2	L5 ROOF TOP MICA HOPPER	None	Filter	1.75 tons/hour	N/A
12-208	BLS-A	BULK LOADING SILO A	None	None	3 tons/hour	N/A
12-209	BLS-B	BULK LOADING SILO B	None	None	3 tons/hour	N/A
12-210	BLS-C	BULK LOADING SILO	None	None	3 tons/hour	N/A
12-211	BLS-D	BULK LOADING SILO D	None	None	3 tons/hour	N/A
12-212	BLSDEF-A	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-213	BLSDEF-B	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-214	BLSDEF-C	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-215	BLSDEF-D	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-216	BLSW-A	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-217	BLSW-B	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-218	BLSW-C	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-219	BLSW-D	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-220	BLSE-A	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-221	BLSE-B	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-222	BLSE-C	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-223	BLSE-D	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-226	L17LPRF	L17 LEXAN# POWDER RECEIVER BAG FILTER	None	Filter	1.5 tons/hour	N/A
12-248	BLSABB	BULK LOADING SILO A BLENDING BLOWER	None	Filter	10 tons/hour	N/A
12-249	BLSBBB	BULK LOADING SILO B BLENDING BLOWER	None	Filter	10 tons/hour	N/A
12-250	RSH2	V-507 STORAGE HOPPER	None	None	3 tons/hour	N/A
12-253	V-1620	L16 IMPACT MODIFIER SURGE HOPPER (EXTRUDER LINE 16)	None	None	1 tons/hour	N/A
12-254	V-1720	L17 IMPACT MODIFIER SURGE HOPPER (EXTRUDER LINE 17)	None	None	1 tons/hour	N/A
12-257	FPRCS1	HOFFMAN BLOWER K-2001	None	Filter	9 tons/hour	N/A
12-258	F-1804	DUST COLLECTION SYSTEM (F1804) - WET SCRUBBER FOR L18	None	Rotoclone	2.5 tons/hour	N/A
12-259	F-1801	V-1804 RESIN BIN WITH F-1801 VENT FILTER - BIN FILTER (L18&19)	None	Filter	2.5 tons/hour	N/A
12-260	F-1802	V-1805 RESIN BIN WITH F-1802 VENT FILTER - BIN FILTER (L18&19)	None	Filter	2.5 tons/hour	N/A
12-261	V-1808A	V-1808A LEXAN# PELLET BIN	None	None	2.5 tons/hour	N/A
12-262	V-1808B	V-1808B LEXAN# PELLET BIN	None	None	2.5 tons/hour	N/A
12-263	V-1806	V-1806 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-264	V-1815	V-1815 LEXAN# POWDER RECEIVER	None	Filter	1.5 tons/hour	N/A
12-265	V-1801	V-1801 RECYCLE BIN	None	None	1.875 tons/hour	N/A
12-266	V-1803	L18 V-1803 FLAME RETARDANT	None	None	2.5 tons/hour	N/A
12-267	V-1807	L18 LEXAN# V-1807 MISCELLANEOUS PELLET BIN	None	None	2.5 tons/hour	N/A
12-268	L18E	EXTRUDER FUME VENTILATION LINE 18	None	None	2.5 tons/hour	N/A
12-268	L19E	EXTRUDER FUME VENTILATION LINE 19	None	None	2.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
12-269	F-1901	L19 DUST COLLECTION SYSTEM (F1901) - WET SCRUBBER	None	Rotoclone	2.5 tons/hour	N/A
12-270	F-1902	V-1930 RESIN BIN WITH F-1902 VENT FILTER	None	Filter	2.5 tons/hour	N/A
12-271	V-1931	V-1931 MISCELLANEOUS PELLET BIN	None	Filter	2.5 tons/hour	N/A
12-272	V-1932	V-1932 LEXAN# POWDER BIN	None	Filter	2.5 tons/hour	N/A
12-273	V-1905	V-1905 LEXAN# POWDER RECEIVER	None	Filter	2.5 tons/hour	N/A
12-274	V-1928	L19 V-1928 FLAME RETARDANT BIN	None	None	2.5 tons/hour	N/A
12-275	V-1929	L19 V-1929 FLAME RETARDANT BIN	None	None	2.5 tons/hour	N/A
12-276	V-1902	L19 V-1902 RECYCLE BIN	None	None	2.5 tons/hour	N/A
12-277	V-1904	V-1904 IMPACT MODIFIER PELLET BIN	None	None	2.5 tons/hour	N/A
12-278	V-1906	V-1906 IMPACT MODIFIER	None	None	2.5 tons/hour	N/A
12-279	K-1902A	L18&19 K-1902 A VACUUM BLOWER	None	Filter	2.5 tons/hour	N/A
12-280	K-1902B	L18&19 K-1902 B VACUUM BLOWER	None	Filter	2.5 tons/hour	N/A
12-350	L5-13	EXTRUDER FUME VENTILATION LINES 5 TO 13 NORTH	None	None	6 tons/hour	N/A
12-352	CVACB	CENTRAL VACUUM CLEANING	None	None	60 tons/hour	N/A
12-400	L5BFDC	L5, 6, 7 DUST COLLECTOR	None	Filter	1 tons/hour	N/A
12-404	L15FGPF	LINE 15 FIBERGLASS LIW FEEDER	None	None	2 tons/hour	N/A
12-405	PDL15	LINE 15 PELLET DRYER	None	None	3.5 tons/hour	N/A
12-406	PDL16	LINE 16 PELLET DRYER	None	None	3.5 tons/hour	N/A
12-409	IMP MOD DC	IMPACT MODIFIER DUST COLLECTOR	None	Filter	3.25 tons/hour	N/A
12-411	L8-13DC	L8-13 DUST COLLECTOR SYSTEM BLOWER K-002	None	Filter	1 tons/hour	N/A
12-412	SILOJ/KVB	SILO J & K DUST COLLECTOR	None	Filter	3 tons/hour	N/A
12-413	MICASILOF K	MICA SILO FLEX KLEEN	None	Filter	2 tons/hour	N/A
12-414	L5BS	LINE 5 BLENDER SURGE HOPPER	None	None	1 tons/hour	N/A
12-415	L6BSDC	L6 BLENDER SURGE HOPPER	None	None	1 tons/hour	N/A
12-416	RBCH	BAGGER-1 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-417	CFPD1F	CONAIR / FRANKLIN DRYER	None	None	0.0855 tons/hour	N/A
12-418	CFPD2F	CONAIR / FRANKLIN DRYER	None	None	0.0855 tons/hour	N/A
12-419	L16ROTO	LINE 16 ROTOCLONE	None	None	3.75 tons/hour	N/A
12-420	L17ROTO	LINE 17 ROTOCLONE	None	None	3.75 tons/hour	N/A
12-421	L5 S/U REC	LINE 5 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-422	L5 RECYC	LINE 5 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-423	L5FRCF	LINE 5 FR HOPPER	None	None	2 tons/hour	N/A
12-424	L6 REC	LINE 6 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-425	L6FRCF	LINE 6 FR HOPPER	None	None	2 tons/hour	N/A
12-426	L6 S/U REC	LINE 6 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-427	L7 S/U REC	LINE 7 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-428	L8 L/KM	V920 LINE 8 MISC VESSEL	None	None	2 tons/hour	N/A
12-429	L8 S/U REC	V921 LINE 8 STARTUP VESSEL	None	None	2 tons/hour	N/A
12-436	L10 FR	L10 FLAME RETARDANT BIN	None	None	2 tons/hour	N/A
12-438	L10 REC	LINE 10 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-439	L10 S/U	LINE 10 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-440	L11REC	LINE 11 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-441	L11S/UREC	LINE 11 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-442	L11FR	LINE 11 FR HOPPER	None	None	2 tons/hour	N/A
12-443	L12 S/U	LINE 12 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-444	L13S/U	LINE 13 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-447	L18 S/U	V-1802 LINE 18 STARTUP RECYCLE VENT	None	None	3 tons/hour	N/A
12-448	L19 S/U	V-1903 LINE 19 STARTUP RECYCLE VENT	None	None	3 tons/hour	N/A
12-449	L7APH	LINE 7A PACKING HOPPER	None	None	1.5 tons/hour	N/A
12-451	L5PH	LINE 5 PACKING HOPPER	None	None	1.5 tons/hour	N/A
12-452	L6PH	LINE 6 PACKING HOPPER	None	None	1.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
12-453	PROD BLEND	PK1 PRODUCT BLENDER - FOR ALL LINES	None	None	3 tons/hour	N/A
12-454	L7VB	LINE 7 V - BIN	None	None	1.5 tons/hour	N/A
12-455	PK1V507	PK1 V-507	None	None	1.5 tons/hour	N/A
12-461	B1B2LEXH	B1, B2 LEXAN# PELLET HOPPER	None	None	1.5 tons/hour	N/A
12-462	A1A2LPH	A1, A2 LEXAN# PELLET HOPPER	None	None	1.5 tons/hour	N/A
12-468	PIGROTO	PIGMENT ROOM ROTOCLONE	None	None	less than 100 lbs/hr	N/A
12-471	MISC VENT	LINE 7 ROTOCLONE EXHAUST	None	None	less than 100 lbs/hr	N/A
12-477	L6 315FK	L6 315 FLEX KLEEN	None	None	2 tons/hour	N/A
12-478	L6 195FK	L6 195 BIN EXHAUST	None	None	2 tons/hour	N/A
12-480	L7 FR	L7 FIRE RESISTANT BIN	None	None	2 tons/hour	N/A
12-481	L7RECYC	L7 RECYCLE BIN	None	None	2 tons/hour	N/A
12-482	L7 315BH	LINE 7 315 BAGHOUSE	None	Filter	2 tons/hour	N/A
12-483	L7 195BH	LINE 7 195 BAGHOUSE	None	Filter	2 tons/hour	N/A
12-484	L6-MICA	LINE 6 ROOF TOP MICA HOPPER	None	Filter	1 tons/hour	N/A
12-485	L10 195SEM	LINE 10 RESIN 195 HOPPER	None	Filter	2 tons/hour	N/A
12-486	L10 315BH	LINE 10 RESIN 315 HOPPER	None	Filter	2 tons/hour	N/A
12-488	L11 195BH	LINE 11 RESIN 195 HOPPER	None	Filter	2 tons/hour	N/A
12-489	L11 315BH	LINE 11 RESIN 315 HOPPER	None	Filter	2 tons/hour	N/A
12-490	CL4 RECYC	CL4 RECYCLE BIN	None	None	0.5 tons/hour	N/A
12-491	CL4FR	CL4 FIRE RESISTANT BIN	None	None	0.5 tons/hour	N/A
12-494	CL5-7FK195	CL 5195 FLEX KLEEN	None	None	0.5 tons/hour	N/A
12-495	CL5315FK	CL5 315 FLEX KLEEN	None	Filter	0.5 tons/hour	N/A
12-497	L17REC	LINE 17 RECYCLE	None	None	2.5 tons/hour	N/A
12-498	L17FR	L17 FIRE RESISTANT	None	None	2.5 tons/hour	N/A
12-499	PK3VACB	VACUUM BLOWER PK3 SYSTEM	None	Filter	4 tons/hour	N/A
12-500	V-300A	PACK 3 PELLET HOPPER 1	None	None	4 tons/hour	N/A
12-501	V-300B	PACK 3 PELLET HOPPER 2	None	None	4 tons/hour	N/A
12-502	V-300E	PACK 3 PELLET HOPPER 3	None	None	4 tons/hour	N/A
12-503	V-302A	PACK 3 PELLET HOPPER 4	None	None	4 tons/hour	N/A
12-504	V-302B	PACK 3 PELLET HOPPER 5	None	None	4 tons/hour	N/A
12-506	PK3 V-BIN	PACK 3 V-BIN (V-304)	None	None	4 tons/hour	N/A
12-507	L8AVB	LINE 8A V-BIN 830	None	None	2 tons/hour	N/A
12-508	L8BVB	LINE 8B V-BIN 840	None	None	2 tons/hour	N/A
12-509	L12VBA	LINE 12A V-BIN	None	None	1.5 tons/hour	N/A
12-510	L12VBB	LINE 12B V-BIN	None	None	1.5 tons/hour	N/A
12-511	L13VBA	LINE 13A V-BIN	None	None	1.5 tons/hour	N/A
12-512	L13VBB	LINE 13B V-BIN	None	None	1.5 tons/hour	N/A
12-515	L12 BH	LINE 12 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-516	L16ABH	LINE 16A BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-517	L13BH	LINE 13 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-518	L17ABH	LINE 17A BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-519	L15BHA	LINE 15 BAGGING HOPPER A	None	None	3.25 tons/hour	N/A
12-520	L15BHB	LINE 15 BAGGING HOPPER B	None	None	3.25 tons/hour	N/A
12-521	L18BH	LINE 18 BAGGING HOPPER	None	None	3.25 tons/hour	N/A
12-522	L17BBH	LINE 17B BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-523	L16BBH	LINE 16B BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-524	CL15-16 EF	LINE 15/16 SYSTEM/EXHAUST	None	None	0.25 tons/hour	N/A
12-526	L17-EF	LINE 17 EXHAUST FAN	None	None	0.25 tons/hour	N/A
12-533	BLS-E	BULK LOADING SILO E BIN VENT	None	None	3 tons/hour	N/A
12-534	BLS-F	BULK LOADING SILO F BIN VENT	None	None	3 tons/hour	N/A
12-535	BLS-G	BULK LOADING SILO G BIN VENT	None	None	3 tons/hour	N/A
12-536	BLS-H	BULK LOADING SILO H BIN VENT	None	None	3 tons/hour	N/A
12-537	BLSDEF-E	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-538	BLSDEF-F	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-539	BLSDEF-G	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-540	BLSDEF-H	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
12-541	BLSW-E	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-542	BLSW-F	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-543	BLSW-G	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-544	BLSW-H	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-545	BLSE-E	BLS LOADING EXHAUST E	None	None	10 tons/hour	N/A
12-546	BLSE-F	BLS LOADING EXHAUST F	None	None	10 tons/hour	N/A
12-547	BLSE-G	BLS LOADING EXHAUST G	None	None	10 tons/hour	N/A
12-548	BLSE-H	BLS LOADING EXHAUST H	None	None	10 tons/hour	N/A
12-564	L5RBA	LINE 5 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-565	L5RBB	LINE 5 RESIN BIN B 315	None	Filter	2 tons/hour	N/A
12-566	L7RBA	LINE 7 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-567	L7RBB	LINE 7 RESIN BIN B 315	None	Filter	2 tons/hour	N/A
12-568	V-1930	LINE 19 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-571	V-1926	LINE 19 PACKAGING HOPPER	None	None	2 tons/hour	N/A
12-573	V-451	LINE CL2 BAGGING HOPPER	None	None	2 tons/hour	N/A
12-574	V-450	LINE CL4 BAGGING HOPPER	None	None	2 tons/hour	N/A
12-575	V-1924	LINE 19 BAGGING HOPPER A	None	None	2 tons/hour	N/A
12-576	V-1925	LINE 19 BAGGING HOPPER B	None	None	2 tons/hour	N/A
12-578	L12FR	LINE 12 FR HOPPER	None	None	0.15 tons/hour	N/A
12-580	L12RECYC	LINE 12 RECYCLE HOPPER	None	None	0.3 tons/hour	N/A
12-584	L7BLEND	LINE 7 BLENDER	None	None	0 tons/hour	N/A
12-585	L19BLEND	LINE 19 BLENDER	None	None	1.5 tons/hour	N/A
12-588	BPC	BERRINGER PARTS CLEANER - OLD	None	None	0 tons/hour	N/A
12-589	L13FR	LINE 13 FR HOPPER	None	None	1.5 tons/hour	N/A
12-590	L13REC	LINE 13 RECYCLE HOPPER	None	None	1.5 tons/hour	N/A
12-591	L13PET	LINE 13 PET HOPPER	None	None	1.5 tons/hour	N/A
12-592	L13M	LINE 13 MISC. HOPPER	None	None	1.5 tons/hour	N/A
12-593	L11VB	LINE 11 V-BIN	None	None	1.5 tons/hour	N/A
12-594	L11BH	LINE 11 BAGGING HOPPER	None	None	1.5 tons/hour	N/A
12-596	L10VB	LINE 10 V-BIN	None	None	1.5 tons/hour	N/A
12-597	L10PH	LINE 10 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-599	L8LPFB	L8 LEXAN# POWDER DAY BIN BAG FILTER B	None	Filter	1.5 tons/hour	N/A
12-600	L8KMV	V-1515B LINE 8 KM VESSEL	None	None	0.5 tons/hour	N/A
12-601	V-1913	V-1913 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-602	L18/19DC	LINE 18/19 DUST COLLECTOR	None	Filter	less than 100 lbs/hr	N/A
12-603	L8PH	V8-50 LINE PACK HOPPER	None	None	2 tons/hour	N/A
12-604	V-1403	V-1402 195 HOPPER (FINE GRINDS)	None	None	2 tons/hour	N/A
12-605	V-1407	V-1407 315 HOPPER (FINE GRINDS)	None	None	2 tons/hour	N/A
12-606	CL5FR	CL5 FR HOPPER	None	None	0.5 tons/hour	N/A
12-607	TMTCB	TMTC SILO B	None	Filter	4 tons/hour	N/A
12-608	V-1905	V-1905 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-610	BPC NEW	BERRINGER PARTS CLEANER - NEW	None	None	0 tons/hour	N/A
12-611	MDB K-100	METAL DETECTOR BLOWER K-100	None	Filter	6 tons/hour	N/A
12-612	MDB K-101	METAL DETECTOR BLOWER K-101	None	Filter	6 tons/hour	N/A
12-613	F30002	LINE 7 FR25 DUST COLLECTOR F30002	None	Filter	2 tons/hour	N/A
12-614	F30003	LINE 15 FR25 DUST COLLECTOR F30002	None	Filter	2 tons/hour	N/A
12-615	BAG2 BBR	BAGGER-2 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-616	BAG3 BBR	BAGGER-3 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-617	B-5000D	215 HPR BLOWER B-5000D	None	Filter	3 tons/hour	N/A
12-618	B-30001	PET TRANSFER BLOWER B-30001	None	Filter	3 tons/hour	N/A
12-619	K-3001	OFF-LINE DEMETALIZER K-3001	None	Filter	2 tons/hour	N/A
12-620	PVCS	PACKAGING VACUUM CLEANING SYSTEM	None	None	less than 100 lbs/hr	N/A
12-621	B-0201	FR SILO VACUUM BLOWER B-0201	None	Filter	3 tons/hour	N/A
12-622	L17 LPH	LINE 17 LEX POWDER HOPPER	None	None	3 tons/hour	N/A
12-623	L16 LPFR	LINE 16 LEX POWDER FILTER RECEIVER	None	Filter	3 tons/hour	N/A
12-624	L16 LPH	LINE 16 LEX POWDER HOPPER	None	None	3 tons/hour	N/A
12-625	F3150A	F3150A FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A
12-626	F3150B	F3150B FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
12-627	F3150C	F3150C FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A
12-628	FH V-3000	315 FINES HOPPER V-3000	None	None	0.5 tons/hour	N/A
12-628	FH V-3002	195 FINES HOPPER V-3002	None	None	0.5 tons/hour	N/A
12-630	HB K-004	HOFFMAN BLOWER K-004	None	Filter	9 tons/hour	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

A.15 HPP Co-Polymer [Section P]

A.15.1 HPP Co-Polymer, Buildings 47 and 48

HPP Co-Polymer Affected Facilities/Sources

(a) The HPP Co-Polymer Area includes four miscellaneous organic chemical manufacturing units (MCPU) which are part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing units are identified as HppMONCoP1, HppMONCoP2, HppMONCoP3, and HppMONCoP4. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials specified in 40 CFR 63.2435(b)(1). MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to HppMONCoP1, HppMONCoP2, HppMONCoP3, and HppMONCoP4 are specified in Section N of this permit.

HPP Co-Polymer Operations

(b) The HPP Co-Polymer operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-103	AVB	AUTOMATIQUE VACUUM BLOWER	None	None	1.0 tons/hour	1989
47A-001	10 CVR	10 CV REACTOR	WSC**	10 CV Condenser	N/A	1991
47A-001	40 CV FP	40 CV FREEZE POT	WSC**	40 CV Freeze Pot; 40 CV Condenser	N/A	1991
47A-002	HOT OIL	HOT OIL EXPANSION TANK	None	None	N/A	1991

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
13-001	V-221	REFRIGERATED CONDENSER*	None	None	N/A	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-004	J-302	VACUUM JET J-302 VENT - REFRIGERATED CONDENSER*	None	None	N/A	N/A
13-005	J-501	REFRIGERATED CONDENSER (WITH CARBON ADSORBER)*	None	None	N/A	N/A
13-005	J-502	REFRIGERATED CONDENSER (WITH CARBON ADSORBER)*	None	None	N/A	N/A
13-006	V-715	HOT OIL EXPANSION TANK VENTS	None	None	less than 40 m^3	N/A
13-008	A-208	BPA-DA BAG DUMP	None	None	less than 100 lb/hr	N/A
13-010	A-311	BPA-DA BAG DUMP	None	None	less than 100 lb/hr	N/A
13-015	A-713	FUGITIVE DUST COLLECTOR	None	Filter	less than 100 lb/hr	N/A
13-027	V-514	HOTWELL (V514) VENT	None	None	less than 40 m^3	N/A
13-092	V-717	HOT OIL EXPANSION TANK	None	None	less than 40 m^3	N/A
13-169	V-4008A	MOLTON POLYMER HANDLING SYSTEM	None	None	N/A	N/A
13-250	PEWSCD	PROCESSING EQUIPMENT (WITH WATER SRUBBER AND CARBON DRUM)*	None	None	0.30 tons/hour	N/A
13-257	BF-X511	PELLETIZER RECOVERY FILTER	None	Filter	0.15 tons/hour	N/A
13-258	V-6009	MPD STORAGE TANK, V4008C	None	None	less than 40 m^3	N/A
13-259	DCS BLDG48	CENTRAL DUST COLLECTOR SYSTEM	None	Filter	less than 100 lb/hr	N/A
13-274	UTC CTC1	ULTEM# CO-POLYMER COOLING TOWER CELL 1	None	None	N/A	N/A
13-275	UTC CTC2	ULTEM# CO-POLYMER COOLING TOWER CELL 2	None	None	N/A	N/A
13-276	X-560B	VACUUM PUMP	None	None	N/A	N/A
13-362	DDDC	BPA-DA DRUMMING DUST COLLECTOR	None	Filter	less than 100 lb/hr	N/A
47A-003	DIS-8CV	DISENTRAINMENT 8CV	Carbon Canister***	8 CV Freeze Pot; 8 CV Condenser	N/A	1991

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The amount of VOC entering each of these control devices is 2.6 lb/hr VOC or less; this amount of VOC would not trigger an air regulatory requirement to install a control device. The source has installed this equipment to reduce emissions that would otherwise not require control.
** The amount of VOC entering WSC is less than 5 tons/yr; this amount of VOC would not trigger an air regulatory requirement to install a control device; however, a water scrubber (WSC) controls emissions from 10CVR and 40 CV FP to reduce emissions that would otherwise not require control.
*** The amount of VOC entering the carbon canister is less than 0.1 tons/yr; this amount of VOC would not trigger an air regulatory requirement to install a control device.

A.16 HPP ChemOps [Section Q]

A.16.1 HPP ChemOps, Buildings 58 and 59

HPP ChemOps Affected Facilities/Sources

(a) [Reserved]

(b) The HPP ChemOps Area includes two miscellaneous organic chemical manufacturing units (MCPU) which are part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing units are identified as HppMONMon1 and HppMONPol1. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials in 40 CFR 63.2435(b)(1). MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to HppMONMon1 and HppMONPol1 are specified in Section N of this permit.

(c) H-1100, located in the HPP ChemOps area, is classified as a commercial and industrial solid waste incineration unit (CISWI). This unit is subject to applicable requirements in 326 IAC 11-8, which incorporates specific provisions of 40 CFR 60, Subpart DDDD. The boundaries of the H-1100 CISWI unit are defined as, but not limited to, the commercial or industrial solid waste fuel feed system, grate system, flue gas system, and bottom ash. H-1100 does not include air pollution control equipment or the stack. Upon reconstruction the H-1100 CISWI unit would no longer be subject to requirements in 326 IAC 11-8 and would become an affected facility subject to 40 CFR 60, Subpart CCCC requirements.

(d) The affected facilities subject to 40 CFR 60, Subpart Dc are identified as H-900 and H-900B. The affected facility is each steam generating unit for which construction, modification, or reconstruction is commenced after June 9, 1989 and that has a maximum design heat input capacity of 29 megawatts (MW) (100 million Btu per hour (Btu/hr)) or less, but greater than or equal to 2.9 MW (10 million Btu/hr).

HPP ChemOps Operations

(e) The HPP ChemOps operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity[(c)]	Date of Construct
13-042	V-500A[(f)]	DA HOLD TANK	None	None	57.5 m^3	1985
13-042	V-500B[(f)]	DA HOLD TANK	None	None	57.5 m^3	1985
13-042	C1011	TT-604, C1011 VENT HEADER	None	None	N/A	N/A
13-044	V-700	MT-701, V-700 STORAGE TANK	None	None	57.0 m^3	1985
13-048	V-970	V-970 CONCENTRATED WASTE TANK	Condenser C971	None	79.2 m^3	1985

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-049	H-900	HOT OIL BURNER H900	None	None	28.8 mmBtu/hr	N/A
13-054	V-753	PROCESS TANK	Condenser	None	N/A	N/A
13-056	S-800	JC-803, S-800 TOLUENE SUMP	Condenser C801	None	N/A	N/A
13-057	V-830[f]	WASTEWATER SURGE TANK	None	None	67 m^3	1985
13-057	C-861	V840 DRUM VENT	None	None	N/A	N/A
13-058	V-904	V904 HOT OIL STORAGE	None	None	90.6 m^3	1985
13-059	V-903	V903 HOT OIL EXPANSION	None	None	N/A	N/A
13-062	PI/MMA HD	HC-612A&B SWITCH CONDENSERS	Scrubber PI/MMA HD	None	N/A	N/A
13-098	H-1100	THERMAL OXIDIZER	Integrated Abatement System[h]	None	16.3 mmBtu/hr	N/A
13-155	SC-1/2	NOx CONTAINMENT SYSTEM	None	None	N/A	N/A
13-172	MS-361	PI STORAGE	None	None	N/A	N/A
13-279	V-790	STORAGE TANK	None	None	N/A	N/A
13-290	S-800B	TOLUENE WASTEWATER TANK	None	None	N/A	N/A
13-321	H-900B	NEW HOT OIL BURNER	None	None	31.9 mmBtu/hr	N/A
13-322	V-903B	NEW HOT OIL EXPANSION DRUM	None	None	N/A	N/A
13-323	V-904B	NEW HOT OIL STORAGE TANK	None	None	93.1 m^3	2000
13-346	C-1001[e]	VENT CONDENSER	H-2100 Oxidizer	None	N/A	N/A
13-346	C-1021[e]	VENT CONDENSER	H-2100 Oxidizer	None	N/A	N/A
13-346	S-801[e]	LIFT STATION	H-2100 Oxidizer	None	N/A	N/A
13-346	T-105[e]	WASTEWATER STRIPPER	H-2100 Oxidizer	None	N/A	N/A
13-346	V-250[f]	BI SURGE TANK	None	None	64 m^3	1985
13-346	V-240[f]	BI WATER-WASH TANK	None	None	55 m^3	1985
13-346	V-130[f]	NPI SURGE TANK	None	None	61.7 m^3	1985
13-346	V-223[f]	TOLUENE/WATER DECATNER	None	None	57.8 m^3	1985
13-346	V-273[f]	DRY TOLUENE SURGE TANK	None	None	40.1 m^3	1985
13-347	C-1001[e]	VENT CONDENSER (AOS)	None	None	N/A	N/A
13-347	C-1021[e]	VENT CONDENSER (AOS)	None	None	N/A	N/A
13-347	S-801[e]	LIFT STATION (AOS)	None	None	N/A	N/A
13-347	T-105[e]	WASTEWATER STRIPPER (AOS)	None	None	N/A	N/A
13-365	V-750B	CONTAMINATED TOLUENE TANK	Condenser C751B	None	89.0 m^3	1985
Insignificant Activities [d]						

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-045	V-710	MPD STORAGE TANK	None	None	N/A	N/A
13-046	V-730	ODCB TANK	None	None	76.3 m^3	1985
13-050	F-785	BPA SILO VENT FILTER	None	Filter	4.96 tons/hr	N/A
13-055	S-810	JC-802, S810 SUMP	None	None	N/A	N/A
13-060	V-965	V965 REFRIGERANT EXPANSION TANK	None	None	N/A	N/A
13-061	V-905	MS-911 TEMPERED OIL EXPANSION TANK, V-905	None	None	N/A	N/A
13-063	V-740[f]	MMA STORAGE TANK	None	None	44.4 m^3	1985
13-063	T-744	AS701 VENT SCRUBBER T744[g]	None	None	N/A	N/A
13-064	D-390	FLAKER DUST COLLECTOR	None	Filter	1.0 tons/hr	N/A
13-075	W-515	DI-AMINE WEIGHT TANK	None	None	N/A	N/A
13-148	541-T	541-T RAT TANK	None	None	N/A	N/A
13-150	571-T	STORAGE TANK (86%)	None	None	N/A	N/A
13-170	BSST	BULK SALT STORAGE TANK	None	Filter	24.96 tons/hr	N/A
13-261	V-900	INCINERATOR WASTE STOR TANK	None	None	N/A	N/A
13-262	V-79T	CLOTH WASH	None	None	N/A	N/A
13-263	BF-R230MD	MANUAL DUMPER BAG FILTER	None	Filter	N/A	N/A
13-265	V-570A	PRODUCT VERIFICATION BIN	None	None	2.25 tons/hr	N/A
13-266	V-570B	PRODUCT VERIFICATION BIN	None	None	2.25 tons/hr	N/A
13-267	X-560	PELLET TRANSFER SYSTEM	None	None	2.25 tons/hr	N/A
13-270	UMDGFT	HPP MONOMER DIESEL GENERATOR TANK	None	None	N/A	N/A
13-272	ULC CTC1	HPP CHEM-OPS COOLING TOWER CELL 1	None	None	N/A	N/A
13-273	ULC CTC2	HPP CHEM-OPS COOLING TOWER CELL 2	None	None	N/A	N/A
13-278	F400V	F400 SYSTEM VENTILATION	None	None	N/A	N/A
13-284	S-810B	ODCB WASTEWATER TANK	None	None	N/A	N/A
13-319	CTCC3	COOLING TOWER CELL C3	None	None	N/A	N/A
13-320	CTCC4	COOLING TOWER CELL C4	None	None	N/A	N/A
13-340	PABDS	PA BAG DUMP STATION	None	None	Less Than 0.05 tons/hr	N/A
13-341	F-205B	BPA SURGE BIN VENT FILTER	None	Filter	3.6 tons/hr	N/A
13-342	MBLV	MAINTENANCE BLDG LOCAL VENT	None	None	N/A	N/A
13-343	MBRV	MAINTENANCE BLDG ROOF VENT	None	None	N/A	N/A
13-354	102-T/B	JACK TANK #3	None	None	N/A	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.

c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or The maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))
e. The Permittee has the option to vent emission units C-1001, C-1021, S-801, and T-105 to the oxidizer H-2100 or to the atmosphere.
f. Tanks V-500A and V-500B are part of emission unit C1011. Tanks V-273, V-250, V-240, V-130, and V-223 are part of emission unit C-1001. Tank V-830 is part of emission unit C-861. Tank V-740 is part of emission unit T-744.
g. T744 is a safety system integral to process operations and is not considered a control or recovery device.
h. H-1100 is controlled by an integrated abatement system that includes a quench tank, a quench water receiver, wet scrubbing components, and filter cartridges contained in mist eliminators.

Notes: The detailed calculations including emission factor information of the emission units included in this Section Q is treated as confidential information.

For purposes of this permit section, the pounds of steam usage and the fugitive VOC emissions which are both associated with this HPP operation are termed HppSTEAM and FUG, respectively.

Weight hopper recovery filter, identified as F-205; PA/MPD melter and charge tank, identified as V-1565B; separator, identified as KO-500; cloth wash section tank #2, identified as T-79B; and final wash receiver #2, identified as T-70B are considered trivial activities (326 IAC 2-7-1(40)) and were authorized to be built under CP-129-10588-00002, issued on August 24, 1999, but may not have been built. The V-1050 scrubber identified as V-1550 is considered inoperable. The jack tank 1, identified as 100-T, is operable and is routed to the NO_X containment system, identified as SC-1/2. The jack tank 2, identified as 102-T; and the final wash receiver, identified as T-70 are considered operable and have been rerouted to the NO_X containment system, identified as SC-1/2.

A.17 HPP Finishing [Section R]

A.17.1 HPP Finishing, Building 62

HPP Finishing Operations

(a) The HPP Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity[(c)]	Date of Construct
13-035	DC-08	LARGE FINE GRINDER	None	None	0.60 tons/ hour	N/A

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
13-070	B-02	B-02 BLOWER	None	Filter	3.78 tons/ hour	1985
13-071	B-01	B-01 BLOWER	None	Filter	3.78 tons/ hour	1985
13-154	C1 DHE	C1 DIE HEAD EXHAUST	None	None	Less Than 0.05 tons/ hour	N/A
13-165	L-3	PELLET TRANSFER	None	Filter	1.25 tons/ hour	N/A
13-166	L-4	PELLET TRANSFER	None	Filter	1.25 tons/ hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-167	RTV	RESIN TRANSFER VENT	None	Filter	2.50 tons/ hour	N/A
13-168	FPT	FINISHED PRODUCT TRANSFER	None	Filter	1.25 tons/ hour	N/A
13-251	BF-L1	LINE 1 PELLET TRANSFER	None	Filter	0.23 tons/ hour	N/A
13-252	BF-L2	LINE 2 PELLET TRANSFER	None	Filter	0.23 tons/ hour	N/A
13-254	BF-NFG	EAST FINE GRINDER	None	Filter	0.60 tons/ hour	N/A
13-255	CLDC	COLOR LAB DUST COLLECTION	None	Filter	0.07 tons/ hour	N/A
13-256	A/B - FG	WEST FINE GRINDER	None	Filter	1.20 tons/ hour	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

A.18 Emergency Generators and Pumps [Section S]

A.18.1 Emergency Generators and Pumps, Entire Plant Site

Emergency Generators and Pumps

(a) The site generators and pumps listed below are considered the emergency generators and pumps identified as a group, 17-Emer-G. Each emergency generator or pump which is associated with this group is individually identified with an affiliated stack/vent I.D; plant location; date in which the emergency generator or pump was installed; rated horsepower (hp); and heat input.

Stack / Vent I.D	Plant Location	Date Installed	Rated HP	MMBTU/hr
GENERATORS				
17-101	Phenol	Jun-83	760	5.3
17-102	Phenol	Oct-83	450	3.2
17-103	MWTP	Aug-82	900	6.3
17-104	BPA III	Apr-86	1490	10.4
17-105	LEXAN# Resin	Nov-86	1770	12.4
17-106	LEXAN# Resin	Nov-86	1770	12.4
17-107	LEXAN# Resin	Jun-79	930	6.5
17-108	BPA I & II	Feb-82	17	0.1
17-110	LDF	Sep-86	760	5.3
17-111	LDF	Sep-86	760	5.3
17-112	Phosgene	May-80	1600	11.2
17-113	Phosgene	Oct-86	1490	10.4
17-114	Brine	Dec-85	1770	12.4
17-115	Brine	Jan-87	1770	12.4
17-120	ETS	1991	119	0.8
17-121	ULTEM# Monomer	May-90	900	6.3
17-129[a]	Sheet Products	1980	10	0.1
17-130	Sheet Products	Mar-95	60	0.4
17-134	CPP Resin II	Jan-95	1503	10.5
17-135	Bldg. 46 ECC	Feb-96	120	0.8
17-410	Visitor Center	1999	158	1.1
PUMPS				
17-302	Phenol	Jun-90	280	2

Stack / Vent I.D	Plant Location	Date Installed	Rated HP	MMBTU/hr
17-303	Phenol	Jun-90	280	2
17-304	Phenol	Jun-90	280	2
17-411	Mil Water Diesel Pump	1999	300	2.1
17-412	Mil Water Diesel Pump	1999	300	2.1
17-413	Mil Water Diesel Pump	1999	300	2.1
FIRE PUMPS				
17-403	CT#2	1970	220	1.5
17-404	CT#2	1970	220	1.5
17-405	MWTP/BPA	Jan-74	280	2
17-406	MWTP/Bldg. 18	Jun-78	310	2.2
17-407	MWTP/Bldg. 18	Jun-78	310	2.2
17-408	Safety/Phenol	Apr-89	340	2.4
17-409	Safety/Phenol	Apr-89	340	2.4

(a) Stack/Vent ID 17-129 is associated with a gasoline emergency generator; all other emergency generators or pumps listed in this table burn diesel.

Standby Energy Curtailment Generators and Mobile Diesel Units

(b) The generators and mobile diesel units listed below are considered the energy curtailment generators and mobile diesel units identified as a group, 17-S_M-G. Each energy curtailment generator or mobile diesel unit which is associated with this group is individually identified with an affiliated stack/vent I.D; plant location; date in which the energy curtailment generator or mobile diesel unit was installed; rated horsepower (hp); and heat input.

Stack / Vent I.D	Plant Location	Date Installed	Rated HP	MMBTU/hr
STANDBY ENERGY CURTAILMENT DIESEL GENERATORS AND MOBILE DIESEL UNITS				
17-116	CPP Resin III	1984	1580	11.2
17-117	CPP Resin III	1984	1580	11.2
17-118	WWTP Lift Station	1990	2220	15.7
17-119	WWTP Lift Station	1990	2220	15.7
17-125	Substation 2	1994	2161	15.3
17-126	Substation 2	1994	2161	15.3
17-127	Substation 2	1994	1503	10.6
17-131	Substation 1	1995	2161	15.3
17-132	Substation 1	1995	2161	15.3
17-133	Substation 1	1995	2161	15.3

Temporary Emergency Generators

(c) The generators listed below represent temporary, portable, emergency generators. Each emergency generator is individually identified with an affiliated stack/vent I.D.; plant location; rated horsepower (hp); and heat input. Generator units may vary depending upon which units are available when needed.

Stack / Vent I.D	Emission Unit / Description	Plant Location	Maximum HP	Maximum Heat Input (MMBtu/hr)
17-500	17-500 / Emergency Generator	AS NEEDED - Portable	2,332	15.22
17-501	17-501 / Emergency Generator	AS NEEDED - Portable	2,332	15.22

A.19 High Bay [Section T]

A.19.1 High Bay, Building 1A

High Bay Operations

(a) The High Bay operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
18-001	R104OD	ROOM 104 OVEN DRYERS	None	None	less than 100 lbs/hr	N/A
18-002	R102E	ROOM 102 EXTRUDERS	None	None	less than 100 lbs/hr	N/A
18-004	PRODEX S4E	PRODEX S-4 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-005	EGAN S5	EGAN S-5 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-006	HPM(S6)E	HPM S-6 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-007	R105/102VB	R105/102 VACUUM BLOWER	None	None	less than 100 lbs/hr	N/A
18-008	R103BVS	LEXAN# BLEND ROOM AND POWDER TRANSFER	None	Baghouse	less than 100 lbs/hr	N/A
18-010	R102EV	ROOM 102 EXTRUDERS VACUUM	None	None	less than 100 lbs/hr	N/A
18-011	B1BMMO	BLDG. 1B MOLDING MACHINES/OVENS	None	None	less than 100 lbs/hr	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

A.20 Wastewater Treatment Plant [Section U]

A.20.1 Wastewater Treatment Plant

Wastewater Treatment Plant (WWTP) Operations

(a) The Wastewater Treatment Plant (WWTP) operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
16-100	WWTP*	SITE WASTEWATER TREATMENT PLANT	None	None	N/A	N/A

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
16-101	PAC SVF**	PAC SILO VENT FILTER	None	Filter	8 tons/hr	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[d] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).

* The wastewater treatment plant area consists of circular clarifiers, rectangular equalization basins, aeration basins, three six-million gallon open-top impoundment tanks, and other wastewater treatment system equipment.

**The emission unit identified as PAC SVF is a powdered activated carbon storage silo with a bin vent filter. The carbon is pneumatically transferred from the truck to the silo and the filter, which is integral to the process, because the filter is needed to separate the carbon from the transfer air.

A.21 Insignificant Activities [326 IAC 2-7-1(21)] [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]

The source also consists of the following insignificant activities, as defined in 326 IAC 2-7-1(21):

(a) Space heaters, process heaters, or boilers using the following fuels:

(1) Natural gas fired combustion sources with heat input equal to or less than ten million (10,000,000) Btu per hour.

(2) Propane or liquified petroleum gas, or butane-fired combustion sources with heat input equal to or less than six million (6,000,000) Btu per hour.

(3) Fuel oil-fired combustion sources with heat input equal to or less than two million (2,000,000) Btu per hour and firing fuel containing less than five-tenths (0.5) percent sulfur by weight.

(b) Equipment powered by internal combustion engines of capacity equal to or less than 500,000 Btu per hour, except where total capacity of equipment operated by one stationary source exceeds 2,000,000 Btu per hour.

(c) Combustion source flame safety purging on startup.

(d) A gasoline fuel transfer and dispensing operation handling less than or equal to 1,300 gallons per day, such as filling of tanks, locomotives, automobiles, having a storage capacity less than or equal to 10,500 gallons.

(e) A petroleum fuel, other than gasoline, dispensing facility, having a storage capacity of less than or equal to 10,500 gallons, and dispensing less than or equal to 230,000 gallons per month.

(f) The following VOC and HAP storage containers:

(1) Storage tanks with capacity less than or equal to 1,000 gallons and annual throughputs less than 12,000 gallons.

(2) Vessels storing lubricating oils, hydraulic oils, machining oils and machining fluids.

(g) Refractory storage not requiring air pollution control equipment.

(h) Application of oils, greases, lubricants or other nonvolatile materials applied as temporary protective coatings.

(i) Machining where an aqueous cutting coolant continuously floods the machining interface.

(j) Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2] [326 IAC 8-3-5]

(k) Cleaners and solvents characterized as follows:

(1) having a vapor pressure equal to or less than 2 kPa; 15 mm Hg; or 0.3 psi measured at 38 degrees C (100 F) or;

(2) having a vapor pressure equal to or less than 0.7 kPa; 5 mm Hg; or 0.1 psi measured at 20 degrees C (68F); the use of which for all cleaners and solvents combined does not exceed 145 gallons per 12 months.

(l) The following equipment related to manufacturing activities not resulting in the emission of HAPs; brazing equipment, cutting torches, soldering equipment, welding equipment.

(m) Closed loop heating and cooling system.

(n) Infrared cure equipment.

(o) Any of the following structural steel and bridge fabrication activities:

(1) Cutting 20,000 linear feet or less of one inch (1”) plate or equivalent.

(2) Using 80 tons or less of welding consumables.

(p) Rolling oil recovery systems.

(q) Solvent recycling systems with batch capacity less than or equal to 100 gallons.

(r) Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to 1% by volume.

(s) Water runoff ponds for petroleum coke-cutting and coke storage piles.

(t) Activities associated with the transportation and treatment of sanitary sewage, provided discharge to the treatment plant is under the control of the owner/operator, that is, an on-site sewage treatment facility.

(u) Any operation using aqueous solutions containing less than 1% by weight of VOCs excluding HAPs.

(v) Forced and induced draft cooling tower system not regulated under a NESHAP.

(w) Replacement or repair of electrostatic precipitators, bags in baghouses and filters in other air filtration equipment.

(x) Heat exchanger cleaning and repair.

(y) Process vessel degassing and cleaning to prepare for internal repairs.

(z) Trimmers that do not produce fugitive emissions and that are equipped with a dust collection or trim material recovery device such as a bag filter or cyclone. [326 IAC 6-3-2]

(aa) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]

(bb) Conveyors as follows:

(1) Covered conveyors for coal or coke conveying of less than or equal to 360 tons per day;

(2) Uncovered coal conveying of less than or equal to 120 tons per day.

(3) Underground conveyors.

(4) Enclosed systems for conveying plastic raw materials and plastics finished goods.

(cc) Coal bunker and coal scale exhausts and associated dust collector vents.

(dd) Asbestos abatement projects regulated by 326 IAC 14-10. [326 IAC 14-10]

(ee) Purging of gas lines and vessels that is related to routine maintenance and repair of buildings, structures, or vehicles at the source where air emissions from those activities would not be associated with any production processes.

(ff) Equipment used to collect any material that might be released during a malfunction, process upset, or spill cleanup, including catch tanks, temporary liquid separators, tanks, and fluid handling equipment.

(gg) Blowdown for any of the following: sight glass; boiler; compressors; pumps; and cooling tower.

(hh) On-site fire and emergency response training approved by the department.

(ii) Diesel generators not exceeding 1600 horsepower.

(jj) Stationary fire pumps.

(kk) Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to 4000 actual cubic feet per minute, including the following: deburring; buffing; polishing; abrasive blasting; pneumatic conveying; and woodworking operations. [326 IAC 6-3-2]

(ll) Purge double block and bleed valves.

(mm) Filter or coalescer media changeout.

(nn) Vents from ash transport systems not operated at positive pressure.

(oo) Mold release agents using low volatile products (vapor pressure less than or equal to 2 kilopascals measured at 38 degrees C).

(pp) A laboratory as defined in 326 IAC 2-7-1(21)(D).

(qq) Farm operations.

SECTION B GENERAL CONDITIONS

B.1 Definitions [326 IAC 2-7-1]

Terms in this permit shall have the definition assigned to such terms in the referenced regulation. In the absence of definitions in the referenced regulation, the applicable definitions found in the statutes or regulations (IC 13-11, 326 IAC 1-2 and 326 IAC 2-7) shall prevail.

B.2 Permit Term [326 IAC 2-7-5(2)] [326 IAC 2-1.1-9.5] [326 IAC 2-7-4(a)(1)(D)] [IC 13-15-3-6(a)]

(a) This permit, T129-6794-00002 is issued for a fixed term of five (5) years from the effective date of this permit, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3. Subsequent revisions, modifications, or amendments of this permit do not affect the expiration date of this permit.

(b) If IDEM, OAQ, upon receiving a timely and complete renewal permit application, fails to issue or deny the permit renewal prior to the expiration date of this permit, this existing permit shall not expire and all terms and conditions shall continue in effect, including any permit shield provided in 326 IAC 2-7-15, until the renewal permit has been issued or denied.

B.3 Term of Conditions [326 IAC 2-1.1-9.5]

Notwithstanding the permit term of a permit to construct, a permit to operate, or a permit modification, any condition established in a permit issued pursuant to a permitting program approved in the state implementation plan shall remain in effect until:

(a) The condition is modified in a subsequent permit action pursuant to Title I of the Clean Air Act; or

(b) The emission unit to which the condition pertains permanently ceases operation.

B.4 Enforceability [326 IAC 2-7-7]

Unless otherwise stated, all terms and conditions in this permit, including any provisions designed to limit the source's potential to emit, are enforceable by IDEM, the United States Environmental Protection Agency (U.S. EPA) and by citizens in accordance with the Clean Air Act.

B.5 Severability [326 IAC 2-7-5(5)]

The provisions of this permit are severable; a determination that any portion of this permit is invalid shall not affect the validity of the remainder of the permit.

B.6 Property Rights or Exclusive Privilege [326 IAC 2-7-5(6)(D)]

This permit does not convey any property rights of any sort or any exclusive privilege.

B.7 Duty to Provide Information [326 IAC 2-7-5(6)(E)]

(a) The Permittee shall furnish to IDEM, OAQ within a reasonable time, any information that IDEM, OAQ may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The submittal by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34). Upon request, the Permittee shall also furnish to IDEM, OAQ copies of records required to be kept by this permit.

(b) For information furnished by the Permittee to IDEM, OAQ, the Permittee may include a claim of confidentiality in accordance with 326 IAC 17.1. When furnishing copies of requested records directly to U. S. EPA, the Permittee may assert a claim of confidentiality in accordance with 40 CFR 2, Subpart B.

B.8 Certification [326 IAC 2-7-4(f)] [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)(C)]

(a) Where specifically designated by this permit or required by an applicable requirement, any application form, report, or compliance certification submitted shall contain certification by a responsible official of truth, accuracy, and completeness. This certification shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

(b) One (1) certification shall be included, using the attached Certification Form, or its equivalent, with each submittal requiring certification. One (1) certification may cover multiple forms in one (1) submittal.

(c) A responsible official is defined at 326 IAC 2-7-1(34).

B.9 Annual Compliance Certification [326 IAC 2-7-6(5)]

(a) The Permittee shall annually submit a compliance certification report which addresses the status of the source's compliance with the terms and conditions contained in this permit, including emission limitations, standards, or work practices. The initial certification shall cover the time period from the effective date of the permit through December 31 of the same year. All subsequent certifications shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted no later than July 1 of each year to:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

United States Environmental Protection Agency, Region V
Air and Radiation Division, Air Enforcement Branch - Indiana (AE-17J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

(b) The annual compliance certification report required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

(c) The annual compliance certification report shall include the following:

(1) The appropriate identification of each term or condition of this permit that is the basis of the certification;

(2) The compliance status;

(3) Whether compliance was continuous or intermittent;

(4) The methods used for determining the compliance status of the source, currently and over the reporting period consistent with 326 IAC 2-7-5(3); and

(5) Such other facts, as specified in Sections D - U of this permit, as IDEM, OAQ, may require to determine the compliance status of the source.

The submittal by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

B.10 Preventive Maintenance Plan [326 IAC 2 7 5(1),(3) and (13)] [326 IAC 2 7 6(1) and (6)] [326 IAC 1 6 3]

(a) The Permittee shall prepare and maintain Preventive Maintenance Plans (PMPs) as described in 326 IAC 1 6 3 within ninety (90) days after the effective date of this permit for the emission units and air pollution control devices listed in the table below:

Permit Section	Stack vent ID	Emission Unit/APCD	Description
D.2	01-101	NE BOILER	Natural gas-fired boiler
D.2	01-014	BW GAS	Natural gas-fired boiler
D.2	01-100	H BOILER	Natural gas-fired boiler
D.3	01-001	BW1-BOILER/ Fabric Filter	Coal-fired boiler
D.3	01-001	BW2-BOILER/ Fabric Filter	Coal-fired boiler
D.4	01-006	BF-ASVB (Ash handling equipment)	Bag filter for ash handling
E.2	03-107	PhTCU	Thermal Combustion Unit
E.4	03-008	H-530A	Waste/Gas-fired boiler
E.4	03-008	H-530B	Waste/Gas-fired boiler
F.2	04-050	H-6060	BPA III Vent Incinerator
F.2	N/A	H-383/ Condenser	Tar Cracker Phenol Condenser
G.2	05-007	V-723	RESIN II Vent Gas Absorber
G.2	05-013	V-519	RESIN I AND II Vent Gas Absorber
I.1	08-001	C-966 Scrubber	C-966 Scrubber
I.1	08-001	C-967 Scrubber	C-967 Scrubber
I.2	08-706	COS Vent Oxidizer	COS Vent Oxidizer
I.2	08-707	COS Flare	COS Flare
K.2	09-002	E BOILER/ BH1 Baghouse	Coal-fired boiler
K.2	09-002	L BOILER/ BH1 Baghouse	Coal-fired boiler
K.2	09-001	BW-BOILER	Natural gas-fired boiler
K.2	09-002	V BOILER/ BH1 Baghouse	Coal-fired boiler
K.2	09-106	R BOILER	Natural gas-fired boiler
N.3	12-560	V301/401SC	V301/401SC
Q.2	13-056	S-800/ Condenser 801C	JC-803, S-800 Toluene Sump
Q.2	13-048	Condenser C971	Condenser C971
Q.2	13-062	Scrubber PI/MMA HD	Scrubber PI/MMA HD
Q.2	13-346	H2100 Oxidizer	H2100 Oxidizer
Q.2	13-098	H-1100/ Integrated Abatement System	Integrated Abatement System
Q.2	13-346	H-2100 Oxidizer	H-2100 Oxidizer
Q.2	13-365	V-750B/ C751B Condenser	Contaminated Toluene Tank

At a minimum, the PMPs shall include:

(1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;

(2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and

(3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

(b) A copy of the PMPs shall be submitted to IDEM, OAQ, upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ, may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions or potential to emit. The PMPs do not require the certification by the "responsible official" as defined by 326 IAC 2 7 1(34).

(c) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1 6 3 for that unit.

(d) The Permittee shall implement the PMPs, including any required recordkeeping, as necessary to ensure that failure to implement a PMP does not cause or contribute to an exceedance of any limitation on emissions or potential to emit. IDEM, OAQ may require that the Preventive Maintenance Plans be revised if found to be inadequate to reasonably prevent the exceedance of any limitation on emissions.

B.11 Emergency Provisions [326 IAC 2-7-16]

(a) An emergency, as defined in 326 IAC 2-7-1(12), is not an affirmative defense for an action brought for noncompliance with a federal or state health-based emission limitation, except as otherwise provided in this condition.

(b) An emergency, as defined in 326 IAC 2-7-1(12), constitutes an affirmative defense to an action brought for noncompliance with a technology-based emission limitation if the affirmative defense of an emergency is demonstrated through properly signed, contemporaneous operating logs or other relevant evidence that describe the following:

(1) An emergency occurred and the Permittee can, to the extent possible, identify the causes of the emergency;

(2) The permitted facility was at the time being properly operated;

(3) During the period of an emergency, the Permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards or other requirements in this permit;

(4) For each emergency lasting one (1) hour or more, the Permittee notified IDEM, OAQ within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

Telephone Number: 1-800-451-6027 (ask for Office of Air Quality, Compliance Section), or
Telephone Number: 317-233-0178 (ask for Compliance Section)

(5) For each emergency lasting one (1) hour or more, the Permittee submitted the attached Emergency Occurrence Report Form or its equivalent, either by mail or facsimile to:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

within two (2) working days of the time when emission limitations were exceeded due to the emergency.

The notice fulfills the requirement of 326 IAC 2-7-5(3)(C)(ii) and must contain the following:

(A) A description of the emergency;

(B) Any steps taken to mitigate the emissions; and

(C) Corrective actions taken.

The notification which shall be submitted by the Permittee does not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(6) The Permittee immediately took all reasonable steps to correct the emergency.

(c) In any enforcement proceeding, the Permittee seeking to establish the occurrence of an emergency has the burden of proof.

(d) This emergency provision supersedes 326 IAC 1-6 (Malfunctions). This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.

(e) The Permittee seeking to establish the occurrence of an emergency shall make records available upon request to ensure that failure to implement a PMP did not cause or contribute to an exceedance of any limitations on emissions.

(f) Failure to notify IDEM, OAQ, by telephone or facsimile of an emergency lasting more than one (1) hour in accordance with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-7 and any other applicable rules.

(g) If the emergency situation causes a deviation from a technology-based limit, the Permittee may continue to operate the affected emitting facilities during the emergency provided the Permittee immediately takes all reasonable steps to correct the emergency and minimize emissions.

(h) The Permittee shall include all emergencies in the Quarterly Deviation and Compliance Monitoring Report.

B.12 Permit Shield [326 IAC 2-7-15] [326 IAC 2-7-20] [326 IAC 2-7-12]

(a) Pursuant to 326 IAC 2-7-15, the Permittee has been granted a permit shield. The permit shield provides that compliance with the conditions of this permit shall be deemed compliance with any applicable requirements as of the effective date of this permit, provided that either the applicable requirements are included and specifically identified in this permit or the permit contains an explicit determination or concise summary of a determination that other specifically identified requirements are not applicable. The Indiana statutes from IC 13 and rules from 326 IAC, referenced in conditions in this permit, are those applicable at the time the permit was issued. The issuance or possession of this permit shall not alone constitute a defense against an alleged violation

of any law, regulation or standard, except for the requirement to obtain a Part 70 permit under 326 IAC 2-7 or for applicable requirements for which a permit shield has been granted.

This permit shield does not extend to applicable requirements which are promulgated after the effective date of this permit unless this permit has been modified to reflect such new requirements.

(b) In addition to the nonapplicability determinations set forth in Sections D – U, of this permit, IDEM, OAQ has also made the determinations regarding this source as listed in Attachment A.

(c) If, after issuance of this permit, it is determined that the permit is in nonconformance with an applicable requirement that applied to the source on the date of permit issuance, IDEM, OAQ, shall immediately take steps to reopen and revise this permit and issue a compliance order to the Permittee to ensure expeditious compliance with the applicable requirement until the permit is reissued. The permit shield shall continue in effect so long as the Permittee is in compliance with the compliance order.

(d) No permit shield shall apply to any permit term or condition that is determined after issuance of this permit to have been based on erroneous information supplied in the permit application. Erroneous information means information that the Permittee knew to be false, or in the exercise of reasonable care should have been known to be false, at the time the information was submitted.

(e) Nothing in 326 IAC 2-7-15 or in this permit shall alter or affect the following:

(1) The provisions of Section 303 of the Clean Air Act (emergency orders), including the authority of the U.S. EPA under Section 303 of the Clean Air Act;

(2) The liability of the Permittee for any violation of applicable requirements prior to or at the time of the effective date of this permit;

(3) The applicable requirements of the acid rain program, consistent with Section 408(a) of the Clean Air Act; and

(4) The ability of U.S. EPA to obtain information from the Permittee under Section 114 of the Clean Air Act.

(f) This permit shield is not applicable to any change made under 326 IAC 2-7-20(b)(2) (Sections 502(b)(10) of the Clean Air Act changes) and 326 IAC 2-7-20(c)(2) (trading based on State Implementation Plan (SIP) provisions).

(g) This permit shield is not applicable to modifications eligible for group processing until after IDEM, OAQ, has issued the modifications. [326 IAC 2-7-12(c)(7)]

(h) This permit shield is not applicable to minor Part 70 permit modifications until after IDEM, OAQ, has issued the modification. [326 IAC 2-7-12(b)(8)]

B.13 Prior Permits Superseded [326 IAC 2-1.1-9.5] [326 IAC 2-7-10.5]

(a) All terms and conditions of permits established prior to T129-6794-00002 and issued pursuant to permitting programs approved into the state implementation plan have been either

(1) incorporated as originally stated,

(2) revised under 326 IAC 2-7-10.5, or

(3) deleted under 326 IAC 2-7-10.5.

(b) Provided that all terms and conditions are accurately reflected in this combined permit, all previous registrations and permits are superseded by this combined new source review and part 70 operating permit.

B.14 Termination of Right to Operate [326 IAC 2-7-10] [326 IAC 2-7-4(a)]

The Permittee's right to operate this source terminates with the expiration of this permit unless a timely and complete renewal application is submitted at least nine (9) months prior to the date of expiration of the source's existing permit, consistent with 326 IAC 2-7-3 and 326 IAC 2-7-4(a).

B.15 Deviations from Permit Requirements and Conditions [326 IAC 2-7-5(3)(C)(ii)]

(a) Deviations from any permit requirements (for emergencies see Section B - Emergency Provisions), the date(s) of each deviation, the probable cause of such deviations, and any response steps or preventive measures taken shall be reported to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

using the attached Quarterly Deviation and Compliance Monitoring Report, or its equivalent. This report shall be submitted within thirty (30) days of the end of the reporting period. A deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report.

The Quarterly Deviation and Compliance Monitoring Report does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(b) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

(c) The first report shall cover the period commencing on the effective date of this permit and ending on the last day of the reporting period. Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

(d) A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.

B.16 Permit Modification, Reopening, Revocation and Reissuance, or Termination [326 IAC 2-7-5(6)(C)] [326 IAC 2-7-8(a)] [326 IAC 2-7-9]

(a) This permit may be modified, reopened, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a Part 70 permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any condition of this permit. [326 IAC 2-7-5(6)(C)] Such request or notification by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(b) This permit shall be reopened and revised under any of the circumstances listed in IC 13-15-7-2 or if IDEM, OAQ, determines any of the following:

(1) That this permit contains a material mistake.

(2) That inaccurate statements were made in establishing the emissions standards or other terms or conditions.

(3) That this permit must be revised or revoked to assure compliance with an applicable requirement. [326 IAC 2-7-9(a)(3)]

(c) Proceedings by IDEM, OAQ, to reopen and revise this permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. Such reopening and revision shall be made as expeditiously as practicable. [326 IAC 2-7-9(b)]

(d) The reopening and revision of this permit, under 326 IAC 2-7-9(a), shall not be initiated before notice of such intent is provided to the Permittee by IDEM, OAQ at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ, may provide a shorter time period in the case of an emergency. [326 IAC 2-7-9(c)]

B.17 Permit Renewal [326 IAC 2-7-3] [326 IAC 2-7-4] [326 IAC 2-7-8(e)]

(a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAQ, or in other application formats authorized by the Commissioner, and shall include the information specified in 326 IAC 2-7-4. Such information shall be included in the application for each emission unit at this source, except those emission units included on the trivial or insignificant activities list contained in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(40). The renewal application does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Request for renewal shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

(b) A timely renewal application is one that is:

(1) Submitted at least nine (9) months prior to the date of the expiration of this permit; and

(2) If the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

(c) If the Permittee submits a timely and complete application for renewal of this permit, the source's failure to have a permit is not a violation of 326 IAC 2-7 until IDEM, OAQ, takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified in writing by IDEM, OAQ, any additional information identified as being needed to process the application.

B.18 Permit Amendment or Modification [326 IAC 2-7-11] [326 IAC 2-7-12]

(a) Permit amendments and modifications are governed by the requirements of 326 IAC 2-7-11 or 326 IAC 2-7-12 whenever the Permittee seeks to amend or modify this permit.

(b) Any application requesting an amendment or modification of this permit shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

Any such application shall be certified by the "responsible official" as defined by 326 IAC 2-7-1(34).

(c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-7-11(c)(3)]

B.19 Permit Revision Under Economic Incentives and Other Programs [326 IAC 2-7-5(8)] [326 IAC 2-7-12 (b)(2)]

(a) No Part 70 permit revision shall be required under any approved economic incentives, marketable Part 70 permits, emissions trading, and other similar programs or processes for changes that are provided for in a Part 70 permit.

(b) Notwithstanding 326 IAC 2-7-12(b)(1) and 326 IAC 2-7-12(c)(1), minor Part 70 permit modification procedures may be used for Part 70 modifications involving the use of economic incentives, marketable Part 70 permits, emissions trading, and other similar approaches to the extent that such minor Part 70 permit modification procedures are explicitly provided for in the applicable State Implementation Plan (SIP) or in applicable requirements promulgated or approved by the U.S. EPA.

B.20 Operational Flexibility [326 IAC 2-7-20] [326 IAC 2-7-10.5]

(a) The Permittee may make any change or changes at the source that are described in 326 IAC 2-7-20(b), (c), or (e), without a prior permit revision, if each of the following conditions is met:

(1) The changes are not modifications under any provision of Title I of the Clean Air Act;

(2) Any preconstruction approval required by 326 IAC 2-7-10.5 has been obtained;

(3) The changes do not result in emissions which exceed the emissions allowable under this permit (whether expressed herein as a rate of emissions or in terms of total emissions);

(4) The Permittee notifies the:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

United States Environmental Protection Agency, Region V
Air and Radiation Division, Regulation Development Branch - Indiana (AR-18J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

in advance of the change by written notification at least ten (10) days in advance of the proposed change. The Permittee shall attach every such notice to the Permittee's copy of this permit; and

(5) The Permittee maintains records on-site, on a rolling five (5) year basis, which document all such changes and emission trades that are subject to 326 IAC 2-7-20(b), (c), or (e). The Permittee shall make such records available, upon reasonable request, for public review. Such records shall consist of all information required to be submitted to IDEM, OAQ, in the notices specified in 326 IAC 2-7-20(b)(1), (c)(1), and (e)(2).

(b) The Permittee may make Section 502(b)(10) of the Clean Air Act changes (this term is defined at 326 IAC 2-7-1(36)) without a permit revision, subject to the constraint of 326 IAC 2-7-20(a). For each such Section 502(b)(10) of the Clean Air Act change, the required written notification shall include the following:

(1) A brief description of the change within the source;

(2) The date on which the change will occur;

(3) Any change in emissions; and

(4) Any permit term or condition that is no longer applicable as a result of the change.

The notification which shall be submitted is not considered an application form, report or compliance certification. Therefore, the notification by the Permittee does not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(c) Emission Trades [326 IAC 2-7-20(c)]
The Permittee may trade emissions increases and decreases at the source, where the applicable SIP provides for such emission trades without requiring a permit revision, subject to the constraints of Section (a) of this condition and those in 326 IAC 2-7-20(c).

(d) Alternative Operating Scenarios [326 IAC 2-7-20(d)]

(1) The Permittee may make changes at the source within the range of alternative operating scenarios that are described in the terms and conditions of this permit in accordance with 326 IAC 2-7-5(9). No prior notification of IDEM, OAQ, or U.S. EPA is required.

(2) Backup fuel switches specifically addressed in, and limited under, Sections D - U of this permit shall not be considered alternative operating scenarios. Therefore, the notification requirements of part (a) of this condition do not apply.

B.21 Source Modification Requirement [326 IAC 2-7-10.5] [326 IAC 2-2-2]

(a) A modification, construction, or reconstruction is governed by the requirements of 326 IAC 2 and 326 IAC 2-7-10.5.

(b) Any modification at an existing major source is governed by the requirements of 326 IAC 2-2-2.

B.22 Inspection and Entry [326 IAC 2-7-6] [IC 13-14-2-2] [IC 13-30-3-1] [IC 13-17-3-2]

Upon presentation of proper identification cards, credentials, and other documents as may be required by law, and subject to the Permittee's right under all applicable laws and regulations to assert that the information collected by the agency is confidential and entitled to be treated as such, the Permittee shall allow IDEM, OAQ, U.S. EPA, or an authorized representative to perform the following:

(a) Enter upon the Permittee's premises where a Part 70 source is located, or emissions related activity is conducted, or where records must be kept under the conditions of this permit;

(b) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, have access to and copy any records that must be kept under the conditions of this permit;

(c) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, inspect any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit;

(d) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, sample or monitor substances or parameters for the purpose of assuring compliance with this permit or applicable requirements; and

(e) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, utilize any photographic, recording, testing, monitoring, or other equipment for the purpose of assuring compliance with this permit or applicable requirements.

B.23 Transfer of Ownership or Operational Control [326 IAC 2-7-11]

(a) The Permittee must comply with the requirements of 326 IAC 2-7-11 whenever the Permittee seeks to change the ownership or operational control of the source and no other change in the permit is necessary.

(b) Any application requesting a change in the ownership or operational control of the source shall contain a written agreement containing a specific date for transfer of permit responsibility, coverage and liability between the current and new Permittee. The application shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The application which shall be submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-7-11(c)(3)]

B.24 Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-7-5(7)][326 IAC 2-1.1-7]

(a) The Permittee shall pay annual fees to IDEM, OAQ, within thirty (30) calendar days of receipt of a billing. Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ, the applicable fee is due April 1 of each year.

(b) Except as provided in 326 IAC 2-7-19(e), failure to pay may result in administrative enforcement action or revocation of this permit.

(c) The Permittee may call the following telephone numbers: 1-800-451-6027 or 317-233-4230 (ask for OAQ, Billing, Licensing, and Training Section), to determine the appropriate permit fee.

B.25 Credible Evidence [326 IAC 2-7-5(3)] [326 IAC 2-7-6] [62 FR 8314] [326 IAC 1-1-6]

For the purpose of submitting compliance certifications or establishing whether or not the Permittee has violated or is in violation of any emission limitation, standard, or rule in Title 326 of the Indiana Administrative Code, nothing in such title shall preclude the use, including the exclusive use, of any credible evidence or information relevant to whether a source would have been in compliance with the emission limitation, standard, or rule, if the appropriate performance or compliance test or procedure had been performed.

B.26 Applicable Requirements

Many provisions in Sections D - U of the permit contain references to a "permit condition" in Sections AA - PP, as well as a citation to a federal regulation in Title 40 of the Code of Federal Regulations. In each case, the applicable requirement is the federal regulation that is cited (version in effect as of the effective date of this permit, or as specifically updated in an amendment or renewal of this permit). The "permit conditions" in Sections AA - PP are not applicable requirements and are not enforceable; they are solely for informational purposes. The Permittee is not required to certify compliance with any provision in Sections AA - PP.

SECTION C SOURCE OPERATION CONDITIONS

Entire Source

Emission Limitations and Standards [326 IAC 2-7-5(1)]

C.1 Particulate Emission Limitations For Processes with Process Weight Rates Less Than One Hundred (100) Pounds per Hour [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from any process not exempt under 326 IAC 6-3-1(b) or (c) which has a maximum process weight rate less than 100 pounds per hour and to which the control methods in 326 IAC 6-3-2(b) through (d) do not apply shall not exceed 0.551 pounds per hour.

C.2 Opacity [326 IAC 5-1]

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

(a) Opacity shall not exceed an average of forty percent (40%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.

(b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

C.3 Open Burning [326 IAC 4-1] [IC 13-17-9]

The Permittee shall not open burn any material except as provided in 326 IAC 4-1-3, 326 IAC 4-1-4 or 326 IAC 4-1-6. The previous sentence notwithstanding, the Permittee may open burn in accordance with an open burning approval issued by the Commissioner under 326 IAC 4-1-4.1. 326 IAC 4-1-3 (a)(2)(A) and (B) are not federally enforceable.

C.4 Incineration [326 IAC 4-2] [326 IAC 9-1-2]

The Permittee shall not operate an incinerator or incinerate any waste or refuse except as provided in 326 IAC 4-2 and 326 IAC 9-1-2.

C.5 Fugitive Dust Emissions [326 IAC 6-4]

The Permittee shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4 (Fugitive Dust Emissions). 326 IAC 6-4-2(4) is not federally enforceable.

C.6 [Reserved]

C.7 Stack Height [326 IAC 1-7]

The Permittee shall comply with the applicable provisions of 326 IAC 1-7 (Stack Height Provisions), for all exhaust stacks through which a potential (before controls) of twenty-five (25) tons per year or more of particulate matter or sulfur dioxide is emitted. The provisions of 326 IAC 1-7-1(3), 326 IAC 1-7-2, 326 IAC 1-7-3(c) and (d), 326 IAC 1-7-4, and 326 IAC 1-7-5(a), (b), and (d) are not federally enforceable.

C.8 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61, Subpart M]

(a) Notification requirements apply to each owner or operator. If the combined amount of regulated asbestos containing material (RACM) to be stripped, removed or disturbed in a renovation project is at least 260 linear feet on pipes or 160 square feet on other facility

components, or at least thirty-five (35) cubic feet on all facility components, then the notification requirements of 326 IAC 14-10-3 are mandatory. All demolition projects require notification whether or not asbestos is present.

(b) The Permittee shall ensure that a written notification is sent on a form provided by the Commissioner at least ten (10) working days before asbestos stripping or removal work or before demolition begins, per 326 IAC 14-10-3, and shall update such notice as necessary, including, but not limited to the following:

(1) When the amount of affected asbestos containing material increases or decreases by at least twenty percent (20%); or

(2) If there is a change in the following:

(A) Asbestos removal or demolition start date;

(B) Removal or demolition contractor; or

(C) Waste disposal site.

(d) The Permittee shall ensure that the notice is postmarked or delivered according to the guidelines set forth in 326 IAC 14-10-3(2).

(d) The notice to be submitted shall include the information enumerated in 326 IAC 14-10-3(3).

All required notifications shall be submitted to:

Indiana Department of Environmental Management
Asbestos Section, Office of Air Quality
100 North Senate Avenue
MC 61-52 IGCN 1003
Indianapolis, Indiana 46204-2251

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(e) Procedures for Asbestos Emission Control
The Permittee shall comply with the applicable emission control procedures in 326 IAC 14-10-4 and 40 CFR 61.145(c). Per 326 IAC 14-10-1, emission control requirements are applicable for any removal or disturbance of RACM greater than three (3) linear feet on pipes or three (3) square feet on any other facility components or a total of at least 0.75 cubic feet on all facility components.

(f) Demolition and Renovation
The Permittee shall thoroughly inspect the affected facility or part of the facility where the demolition or renovation will occur for the presence of asbestos pursuant to 40 CFR 61.145(a).

(g) Indiana Accredited Asbestos Inspector
The Permittee shall comply with 326 IAC 14-10-1(a) that requires the owner or operator, prior to a renovation/demolition, to use an Indiana Accredited Asbestos Inspector to

thoroughly inspect the affected portion of the facility for the presence of asbestos. The requirement to use an Indiana Accredited Asbestos inspector is not federally enforceable.

Testing Requirements [326 IAC 2-7-6(1)]

C.9 Performance Testing [326 IAC 3-6]

(a) All testing shall be performed according to the provisions of 326 IAC 3-6 (Source Sampling Procedures), except as provided elsewhere in this permit, utilizing any applicable procedures and analysis methods specified in 40 CFR 51, 40 CFR 60, 40 CFR 61, 40 CFR 63, 40 CFR 75, or other procedures approved by IDEM, OAQ.

A test protocol, except as provided elsewhere in this permit, shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require certification by the "responsible official" as defined by 326 IAC 2-7-1(34). The provision to submit a test protocol is not federally enforceable.

(b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date. The notification submitted by the Permittee does not require certification by the "responsible official" as defined by 326 IAC 2-7-1(34). This condition is not federally enforceable.

(c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ, not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ, if the Permittee submits to IDEM, OAQ, a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period. This condition is not federally enforceable.

Compliance Requirements [326 IAC 2-1.1-11]

C.10 Compliance Requirements [326 IAC 2-1.1-11]

The commissioner may require stack testing, monitoring, or reporting at any time to assure compliance with all applicable requirements by issuing an order under 326 IAC 2-1.1-11. Any monitoring or testing shall be performed in accordance with 326 IAC 3 or other methods approved by the commissioner or the U. S. EPA.

Compliance Monitoring Requirements [326 IAC 2-7-5(1)] [326 IAC 2-7-6(1)]

C.11 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

Unless otherwise specified in this permit, all monitoring and record keeping requirements not already legally required shall be implemented within ninety (90) days of the effective date of this permit. If required by any Section D - U, the Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. If due to circumstances beyond its control, that equipment cannot be installed and operated within ninety (90) days, the Permittee may extend the compliance schedule related to the equipment for an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

in writing, prior to the end of the initial ninety (90) day compliance schedule, with full justification of the reasons for the inability to meet this date.

The notification which shall be submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Unless otherwise specified in the approval for the new emission unit(s), compliance monitoring for new emission units or emission units added through a source modification shall be implemented when operation begins.

C.12 Maintenance of Continuous Opacity Monitoring Equipment [326 IAC 2-7-5(3)(A)(iii)]

(a) The Permittee shall install all continuous opacity monitoring systems (COMS) and related equipment as required by a term or condition in Sections D-U of this permit. The Permittee shall calibrate, maintain, and operate all such COMS and related equipment as provided in this Condition. For a boiler, the COMS shall be in operation at all times that the induced draft fan is in operation, except during events when the provisions of Condition C.12(c) and (d) apply.

(b) All COMS shall meet the performance specifications of 40 CFR 60, Appendix B, Performance Specification No. 1, and are subject to monitor system certification requirements pursuant to 326 IAC 3-5.

(c) In the event that a breakdown of a COMS occurs, a record shall be made of the times and reasons of the breakdown and efforts made to correct the problem.

(d) Whenever a COMS is malfunctioning or is down for maintenance or repairs for a period of twenty-four (24) hours or more and a backup COM is not online within twenty-four (24) hours of shutdown or malfunction of the primary COMS, the Permittee shall provide a certified opacity reader, who may be an employee of the Permittee or an independent contractor, to self-monitor the opacity from the emission unit stack.

(1) Opacity readings shall be performed in accordance with 40 CFR 60, Appendix A, Method 9, for a minimum of five (5) consecutive six (6) minute averaging periods beginning not more than twenty-four (24) hours after the start of the malfunction or down time; provided, however, that if such 24-hour period ends during the period beginning two (2) hours before sunset and ending two (2) hours after sunrise, then such opacity readings shall begin within four (4) hours of sunrise on the day following the expiration of such 24-hour period.

(2) Method 9 opacity readings shall be repeated for a minimum of five (5) consecutive six (6) minute averaging periods at least twice per day during daylight operations, with at least four (4) hours between each set of readings, until a COMS is online.

(3) Method 9 readings may be discontinued once a COMS is online.

(4) Any opacity exceedances determined by Method 9 readings shall be reported with the Quarterly Opacity Exceedances Reports.

(5) If abnormal opacity is observed, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An abnormal opacity observation that does not violate an applicable opacity limit is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(e) Nothing in this permit shall excuse the Permittee from complying with the requirements to operate a continuous opacity monitoring system pursuant to 326 IAC 3-5, 40 CFR 60 and/or 40 CFR 63.

C.13 Maintenance of Continuous Emission Monitoring Equipment [326 IAC 2-7-5(3)(A)(iii)]

(a) In the event that a breakdown of a continuous emission monitoring system occurs, a record shall be made of the times and reasons of the breakdown and efforts made to correct the problem.

(b) Nothing in this permit shall excuse the Permittee from complying with the requirements to operate a continuous emission monitoring system pursuant to 326 IAC 3-5 and 40 CFR 60.48b. The provisions of 326 IAC 3-5 are not federally enforceable.

C.14 Monitoring Methods [326 IAC 3] [40 CFR 60] [40 CFR 63]

Any monitoring or testing required by Sections D - U of this permit shall be performed according to the provisions of 326 IAC 3, 40 CFR 60, Appendix A, 40 CFR 60 Appendix B, 40 CFR 63, or other approved methods as specified in this permit.

C.15 Instrument Specifications [326 IAC 2-1.1-11] [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

(a) When required by any condition of this permit, an analog instrument used to measure a parameter related to the operation of an air pollution control device shall have a scale such that the expected maximum reading for the normal range is no less than twenty percent (20%) of full scale.

(b) The Permittee may request that the IDEM, OAQ approve the use of an instrument that does not meet the above specifications provided the Permittee can demonstrate that an alternative instrument specification will adequately ensure compliance with permit conditions requiring the measurement of the parameters.

Corrective Actions and Response Steps [326 IAC 2-7-5] [326 IAC 2-7-6]

C.16 Emergency Reduction Plans [326 IAC 1-5-2] [326 IAC 1-5-3]

Pursuant to 326 IAC 1-5-2 (Emergency Reduction Plans; Submission):

(a) The Permittee prepared and submitted written emergency reduction plans (ERPs) consistent with safe operating procedures on February 14, 2005.

(b) Upon direct notification by IDEM, OAQ, that a specific air pollution episode level is in effect, the Permittee shall immediately put into effect the actions stipulated in the approved ERP for the appropriate episode level.
[326 IAC 1-5-3]

C.17 Risk Management Plan [326 IAC 2-7-5(12)] [40 CFR 68]

If a regulated substance, as defined in 40 CFR 68, is present in a process at a source in more than a threshold quantity, the Permittee must comply with the applicable requirements of 40 CFR 68.

C.18 Response to Excursions or Exceedances [326 IAC 2-7-5] [326 IAC 2-7-6]

(a) Upon detecting an excursion or exceedance from a specified compliance monitoring condition in Sections D-U of this permit, the Permittee shall restore operation of the emissions unit (including any control device and associated capture system) to its normal or usual manner of operation as expeditiously as practicable in accordance with good air pollution control practices for minimizing emissions.

(b) The response shall include minimizing the period of any startup, shutdown or malfunction and taking any necessary corrective actions to restore normal operation and prevent the likely recurrence of the cause of an excursion or exceedance (other than those caused by excused startup or shutdown conditions). Corrective actions may include, but are not limited to, the following:

(1) initial inspection and evaluation;

(2) recording that operations returned to normal without operator action (such as through response by an automated control system); or

(3) any necessary follow-up actions to return operation to within the indicator range, designated condition, or below the applicable emission limitation or standard, as applicable.

(c) A determination of whether the Permittee has used acceptable procedures in response to an excursion or exceedance will be based on information available, which may include, but is not limited to, the following:

(1) monitoring results;

(2) review of operation and maintenance procedures and records;

(3) inspection of the control device, associated capture system, and the process.

(d) Failure to take reasonable response steps shall be considered a deviation from the permit.

(e) The Permittee shall maintain the following records:

(1) monitoring data;

(2) monitor performance data, if applicable; and

(3) corrective actions taken.

(f) For purposes of this Condition C.18, the following definitions, which are based upon those in 40 CFR 64, shall be used:

(1) "Exceedance" shall mean a condition that is detected by monitoring that provides data in terms of an emission limitation or standard and that indicates that emissions (or opacity) are greater than the applicable emission limitation or standard (or less than the applicable standard in the case of a percent reduction requirement), consistent with any averaging period specified for averaging the results of the monitoring.

(2) "Excursion" shall mean a departure from an indicator range established for monitoring under Section D through U of this permit, consistent with any averaging period specified for averaging the results of the monitoring.

C.19 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5] [326 IAC 2-7-6]

(a) When the results of a stack test performed in conformance with Section C - Performance Testing, of this permit exceed the level specified in any condition of this permit, the Permittee shall take appropriate response actions. The Permittee shall submit a description of these response actions to IDEM, OAQ, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize excess emissions from the affected facility while the response actions are being implemented.

(b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAQ that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAQ may extend the retesting deadline.

(c) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

C.20 Emission Statement [326 IAC 2-7-5(3)(C)(iii)] [326 IAC 2-7-5(7)] [326 IAC 2-7-19(c)] [326 IAC 2-6]

(a) Pursuant to 326 IAC 2-6-3(a)(1), the Permittee shall submit by July 1 of each year an emission statement covering the previous calendar year. The emission statement shall contain, at a minimum, the information specified in 326 IAC 2-6-4(c) and shall meet the following requirements:

(1) Indicate estimated actual emissions of all pollutants listed in 326 IAC 2-6-4(a);

(2) Indicate estimated actual emissions of regulated pollutants as defined by 326 IAC 2-7-1 (32) ("Regulated pollutant, which is used only for purposes of Section 19 of this rule") from the source, for purpose of fee assessment. This requirement does not apply if the Permittee pays the maximum fee set forth in 326 IAC 2-7-19.

Emissions from processes that are insignificant or trivial activities as defined in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(40) are not required to be reported in an emission statement.

The statement must be submitted to:

Indiana Department of Environmental Management
Technical Support and Modeling Section, Office of Air Quality
100 North Senate Avenue
MC 61-50 IGCN 1003
Indianapolis, Indiana 46204-2251

The emission statement does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(b) The emission statement required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by

any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

C.21 General Record Keeping Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-6] [326 IAC 2-2]

(a) Records of all required monitoring data, reports and support information required by this permit shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be physically present or electronically accessible at the source location for a minimum of three (3) years. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.

(b) Unless otherwise specified in this permit, all record keeping requirements not already legally required shall be implemented within ninety (90) days of the effective date of this permit.

(c) Pursuant to 326 IAC 2-2-8(b), if there is a reasonable possibility that a "project" (as defined in 326 IAC 2-2-1 (qq)) at an existing emissions unit, other than projects at a Clean Unit, which is not part of a "major modification" (as defined in 326 IAC 2-2-1 (ee)) may result in a significant emissions increase and the Permittee elects to utilize the "projected actual emissions" (as defined in 326 IAC 2-2-1(rr)), the Permittee shall comply with the following:

(1) Before beginning actual construction of the "project" (as defined in 326 IAC 2-2-1 (qq)) at an existing emissions unit, document and maintain the following records:

(A) A description of the project.

(B) Identification of any emissions unit whose emissions of a regulated NSR pollutant could be affected by the project.

(C) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including:

(i) Baseline actual emissions;

(ii) Projected actual emissions;

(iii) Amount of emissions excluded under section 326 IAC 2-2-1(rr)(2)(A)(iii); and

(iv) An explanation for why the amount was excluded, and any netting calculations, if applicable.

(2) Monitor the emissions of any regulated NSR pollutant that could increase as a result of the project and that is emitted by any existing emissions unit identified in (1)(B) above; and

(3) Calculate and maintain a record of the annual emissions, in tons per year on a calendar year basis, for a period of five (5) years following resumption of regular operations after the change, or for a period of ten (10) years following resumption of regular operations after the change if the project increases the design capacity of or the potential to emit that regulated NSR pollutant at the emissions unit.

C.22 General Reporting Requirements [326 IAC 2-7-5(3)(C)] [326 IAC 2-1.1-11] [326 IAC 2-2]

(a) (Reserved)

(b) The reports required by conditions in Sections D - U of this permit shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

(c) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

(d) Unless otherwise specified in this permit, all reports required in Sections D - U of this permit shall be submitted within thirty (30) days of the end of the reporting period, and require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(e) The first report shall cover the period commencing on the effective date of this permit and ending on the last day of the reporting period. Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

(f) If the Permittee is required to comply with the recordkeeping provisions of (c) in Section C- General Record Keeping Requirements for any "project" (as defined in 326 IAC 2-2-1 (qq)) at an existing emissions unit, and the project meets the following criteria, then the Permittee shall submit a report to IDEM, OAQ:

(1) The annual emissions, in tons per year, from the project identified in (c)(1) in Section C- General Record Keeping Requirements exceed the baseline actual emissions, as documented and maintained under Section C- General Record Keeping Requirements (c)(1)(C)(i), by a significant amount, as defined in 326 IAC 2-2-1 (xx), for that regulated NSR pollutant, and

(2) The emissions differ from the preconstruction projection as documented and maintained under Section C- General Record Keeping Requirements (c)(1)(C)(ii).

(g) The report for a project at an existing emissions unit, required in (f) of this condition, shall be submitted within sixty (60) days after the end of the year and contain the following:

(1) The name, address, and telephone number of the major stationary source.

(2) The annual emissions calculated in accordance with (c)(2) and (3) in Section C- General Record Keeping Requirements.

(3) The emissions calculated under the actual-to-projected actual test stated in 326 IAC 2-2-2(d)(3).

(4) Any other information that the Permittee deems fit to include in this report,

Reports required in (g) of this condition shall be submitted to:

Indiana Department of Environmental Management
Air Compliance Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

(h) The Permittee shall make the information required to be documented and maintained in accordance with (c) in Section C- General Record Keeping Requirements available for review upon a request for inspection by IDEM, OAQ. The general public may request this information from the IDEM, OAQ under 326 IAC 17.1.

Stratospheric Ozone Protection

C.23 Compliance with 40 CFR 82 and 326 IAC 22-1

Pursuant to 40 CFR 82 (Protection of Stratospheric Ozone), Subpart F, except as provided for motor vehicle air conditioners in Subpart B, the Permittee shall comply with the standards for recycling and emissions reduction:

(a) Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to 40 CFR 82.156.

(b) Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to 40 CFR 82.158.

(c) Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to 40 CFR 82.161.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY

PART 70 OPERATING PERMIT CERTIFICATION

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002

This certification shall be included when submitting monitoring, testing reports/results or other documents as required by this permit.

Please check what document is being certified:

- ☐ Annual Compliance Certification Letter
- ☐ Test Result (specify)
- ☐ Report (specify)
- ☐ Notification (specify)
- ☐ Affidavit (specify)
- ☐ Other (specify)

I certify that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. Signature:
Printed Name:
Title/Position:
Phone:
Date:

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE BRANCH
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
Phone: 317-233-0178
Fax: 317-233-6865

PART 70 OPERATING PERMIT
EMERGENCY OCCURRENCE REPORT

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002

This form consists of 2 pages **Page 1 of 2**

☐ This is an emergency as defined in 326 IAC 2-7-1(12)

- The Permittee must notify the Office of Air Quality (OAQ), within four (**4**) business hours (1-800-451-6027 or 317-233-0178, ask for Compliance Section); and
- The Permittee must submit notice in writing or by facsimile within two (**2**) working days (Facsimile Number: 317-233-6865), and follow the other requirements of 326 IAC 2-7-16.

If any of the following are not applicable, mark N/A

Facility/Equipment/Operation:
Control Equipment:
Permit Condition or Operation Limitation in Permit:
Description of the Emergency:
Describe the cause of the Emergency:

If any of the following are not applicable, mark N/A **Page 2 of 2**

Date/Time Emergency started:
Date/Time Emergency was corrected:
Was the facility being properly operated at the time of the emergency? Y N Describe: Type of Pollutants Emitted: TSP, PM-10, SO_2, VOC, NO_X, CO, Pb, other:
Estimated amount of pollutant(s) emitted during emergency:
Describe the steps taken to mitigate the problem:
Describe the corrective actions/response steps taken:
Describe the measures taken to minimize emissions:
If applicable, describe the reasons why continued operation of the facilities are necessary to prevent imminent injury to persons, severe damage to equipment, substantial loss of capital investment, or loss of product or raw materials of substantial economic value:

Form Completed by:_____

Title / Position: _____

Date:_____

Phone: _____

A certification is not required for this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

PART 70 OPERATING PERMIT
QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002

Months: _____ to _____ Year: _____

This report shall be submitted quarterly based on a calendar year. Any deviation from the requirements, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. Deviations that are required to be reported by an applicable requirement shall be reported according to the schedule stated in the applicable requirement and do not need to be included in this report. Additional pages may be attached if necessary. If no deviations occurred, please specify in the box marked "No deviations occurred this reporting period".
☐ NO DEVIATIONS OCCURRED THIS REPORTING PERIOD.
☐ THE FOLLOWING DEVIATIONS OCCURRED THIS REPORTING PERIOD

Permit Requirement (specify permit condition #)	
Date of Deviation:	**Duration of Deviation:**
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Permit Requirement (specify permit condition #)	
Date of Deviation:	**Duration of Deviation:**
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Permit Requirement (specify permit condition #)	
Date of Deviation:	**Duration of Deviation:**
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Permit Requirement (specify permit condition #)	
Date of Deviation:	**Duration of Deviation:**
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Permit Requirement (specify permit condition #)	
Date of Deviation:	**Duration of Deviation:**
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Form Completed by:_____

Title / Position: _____

Date:_____

Phone: _____

Attach a signed certification to complete this report.

SECTION D.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Boilerhouse II, Building 2

Boilerhouse II Affected Facilities/Sources

This section lists the provisions of applicable New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the affected facility or source subject to the applicable regulation.

(a) The affected facilities subject to 40 CFR 60, Subpart Db are identified as NE BOILER, BW GAS, and H BOILER. The affected facility is a device which combusts any fuel or byproduct/waste to produce steam or to heat water or any other heat transfer medium, commences construction, modification, or reconstruction after June 19, 1984, and has a heat input capacity of greater than 100 million Btu per hour.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.1.1 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to the affected facilities NE BOILER, BW GAS, and H BOILER.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	NE Boiler	BW Gas	H Boiler
60.11(a)	Compliance with standards and maintenance requirements	X	X	X
60.11(d)	Compliance with standards and maintenance requirements	X	X	X
60.13(a)	Monitoring requirements	X	X	X
60.13(b)	Monitoring requirements	X	X	X
60.13(c)	Monitoring requirements	X	X	X
60.13(d)	Monitoring requirements	X	X	X
60.13(e)	Monitoring requirements	X	X	X
60.13(f)	Monitoring requirements	X	X	X
60.13(g)	Monitoring requirements	X	X	X
60.13(h)	Monitoring requirements	X	X	X

D.1.2 [Reserved]

D.1.3 [Reserved]

D.1.4 [Reserved]

Compliance Determination Requirements

D.1.5 Methods and Procedures [326 IAC 12] [40 CFR 60, Subpart Db]

Pursuant to 40 CFR 60, Subpart Db, compliance determination requirements for boilers NE BOILER, BW GAS, and H BOILER are identified in the following table:

Section II Permit Condition	Applicable 40 CFR Part 60, Subpart Db Requirement	Regulatory Citation Title	NE Boiler	BW Gas	H Boiler
II.3(c)	60.46b(c)	Compliance and Performance Test Methods and Procedures for Particulate Matter and Nitrogen Oxides	X	X	X
II.3(e)(4)	60.46b(e)(4)	Compliance and Performance Test Methods and Procedures for Particulate Matter and Nitrogen Oxides	X	X	X

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

D.1.6 Record Keeping and Reporting Requirements

(a) The table that follows provides recordkeeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to NE BOILER, BW GAS, and H BOILER.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	NE Boiler	BW Gas	H Boiler
60.7(a)	Notification and record keeping	X	X	X
60.7(b)	Notification and record keeping	X	X	X
60.7(c)	Notification and record keeping	X	X	X
60.7(d)	Notification and record keeping	X	X	X
60.7(f)	Notification and record keeping	X	X	X
60.7(g)	Notification and record keeping	X	X	X

(b) All records required to be maintained by Condition D.1.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit the reports and records required to be submitted by Condition D.1.6 to the address listed in Section C - General Reporting Requirements, of this permit.

D.1.7 [Reserved]

D.1.8 [Reserved]

SECTION D.2 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Boilerhouse II, Building 2

Natural Gas fired boilers

(c) The three (3) natural gas fired boilers that are located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-101	NE BOILER	NEBRASKA BOILER natural gas fired, low NOx burners and flue gas recirculation	None	None	250 MMBtu/hr	1989
01-014	BW GAS	B&W #3 GAS BOILER natural gas fired, low NOx burners and flue gas recirculation	None	None	250 MMBtu/hr	1996
01-100	H BOILER	HOLMAN BOILER VENT natural gas fired, low NOx burners and flue gas recirculation	None	None	200 MMBtu/hr	1996

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.2.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

(a) Pursuant 326 IAC 2-2-3 and PSD (65) 1757, Operating Condition 4, issued on September 17, 1989 and revised through the Title V permit, the boiler identified as NE BOILER is limited to 0.12 pounds of NO_x per million Btu of heat input using low NO_x burners with staged combustion air and low excess air as Best Available Control Technology (BACT). Compliance with this BACT limit shall be determined on a 30 day rolling average basis, calculated consistent with 40 CFR 60.49b(g)(3).

(b) Pursuant to CP 129-3877-00002 issued on January 5, 1995, Operating Conditions 9 and 10, as amended by A129-8752-00002 issued on October 30, 1997, the Nitrogen Oxides (NO_x) emissions from the boiler identified as BW GAS shall be limited to 39 tons per 365 days rolled on a daily basis to ensure that NO_x emissions are less than 40 tons per twelve (12) consecutive month period and Prevention of Significant Deterioration (PSD) 326 IAC 2-2 rules are not applicable.

(c) Pursuant to CP 129-4685-00002 issued on October 23, 1995, Operating Conditions 5 and 9 as amended by A129-8752-00002 issued on October 30, 1997, the Nitrogen Oxides (NO_x) emissions from the boiler identified as H BOILER shall be limited to 39 tons per 365 days rolled on a daily basis to ensure that NO_x emissions are less than 40 tons per twelve (12) consecutive month period and Prevention of Significant Deterioration (PSD) 326 IAC 2-2 rules are not applicable.

D.2.2 New Source Performance Standard (NSPS) [326 IAC 12] [40 CFR 60, Subpart Db]

Pursuant to 40 CFR 60.44b(a) and 326 IAC 12, nitrogen oxide (NO_x) emissions shall be limited to 0.2 pounds per million Btu of heat input for the boilers identified as NE BOILER, BW GAS and H BOILER. The table that follows provides the specific applicable standards and monitoring provisions that apply to these boilers and the condition number where a description of the provisions can be found in Section II.

Section II Permit Condition	Applicable 40 CFR Part 60, Subpart Db Requirement	Regulatory Citation Title	NE BOILER	BW GAS	H BOILER
II.1(a)	60.44b(a)	Standard for Nitrogen Oxides	X	X	X
II.1(h)	60.44b(h)	Standard for Nitrogen Oxides	X	X	X
II.1(i)	60.44b(i)	Standard for Nitrogen Oxides	X	X	X
II.2(b)	60.48b(b)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X
II.2(c)	60.48b(c)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X
II.2(d)	60.48b(d)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X
II.2(e)	60.48b(e)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X
II.2(f)	60.48b(f)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X
II.2(g)	60.48b(g)	Emission Monitoring for Particulate Matter and Nitrogen Oxides	X	X	X

D.2.3 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-1]

Pursuant to 326 IAC 6-2-1(g) and PC (65)1757, Condition 1, issued on September 17, 1989, and revised through the Title V permit, particulate emissions shall be limited to 0.152 pounds per MMBtu of heat input for the boiler identified as NE BOILER.

D.2.4 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating: Emission limitations for facilities specified in 326 IAC 6-2-1(d)), the PM emissions from boilers H BOILER and BW GAS shall each not exceed 0.15 pound per million Btu heat input (lb/MMBtu). This limitation was calculated using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$ Where Q = total source capacity (MMBtu/hr)

Q = 2051.4 and 2301.4 (MMBtu/hr) for H BOILER and BW GAS, respectively.

Compliance Determination Requirements

D.2.5 Continuous Emissions Monitoring [326 IAC 3-5] [326 IAC 12] [40 CFR 60, Subpart Db] [326 IAC 2-2]

Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions) and 40 CFR 60.48b (Emission Monitoring for Particulate Matter and Nitrogen Oxides) and in order to demonstrate compliance with Conditions D.2.1 and D.2.2, a continuous monitoring system, which meets the performance specifications of 326 IAC 3-5-2, shall be calibrated, maintained, and operated for each boiler NE

BOILER, BW GAS, and H BOILER for measuring NO_x. The continuous emissions monitoring also demonstrates compliance with Condition Q.2.1(c) as specified in Condition Q.2.10(a)(3).

D.2.6 NO_x Monitoring System Downtime [326 IAC 2-2] [326 IAC 12] [40 CFR 60, Subpart Db]

In instances of NO_x continuous emission monitoring system (CEMS) downtime, the Permittee shall obtain NO_x emissions data according to the requirements of 40 CFR 60.48b(f).

D.2.7 Opacity [326 IAC 5-1]

In order to demonstrate compliance with 326 IAC 5-1, NE BOILER, BW GAS, and H BOILER shall only burn natural gas.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

D.2.8 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 60, Subpart Db and to document compliance with Condition D.2.1(a) and D.2.2, the Permittee shall keep records and submit reports as specified in the following federal citations as described in Section II.

Section II Permit Condition	Applicable 40 CFR Part 60, Subpart Db Requirement	Regulatory Citation Title	NE BOILER	BW GAS	H BOILER
II.4(d)	60.49b(d)	Reporting and Recordkeeping Requirements	X	X	X
II.4(g)	60.49b(g)	Reporting and Recordkeeping Requirements	X	X	X
II.4(h)	60.49b(h)	Reporting and Recordkeeping Requirements	X	X	X
II.4(i)	60.49b(i)	Reporting and Recordkeeping Requirements	X	X	X
II.4(v)	60.49b(v)	Reporting and Recordkeeping Requirements	X	X	X
II.4(w)	60.49b(w)	Reporting and Recordkeeping Requirements	X	X	X

(b) To document compliance with NO_x Conditions D.2.1(b) and (c), and D.2.5, the Permittee shall maintain records of all NO_x continuous emissions monitoring data, pursuant to 326 IAC 3-5-6.

(c) A quarterly summary of the information to document compliance with Condition D.2.1(b) and (c), and D.2.5 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(d) Pursuant to 326 IAC 3-5-7(5) and to comply with D.2.5, reporting of continuous monitoring system instrument downtime, except for zero (0) and span checks, which shall be reported separately, shall include the following:

(1) Date of downtime.

(2) Time of commencement.

(3) Duration of each downtime.

(4) Reasons for each downtime.

(5) Nature of system repairs and adjustments.

The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(e) All records required to be maintained by Condition D.2.8 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(f) The Permittee shall submit the reports and records required to be submitted by Condition D.2.8 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION D.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Boilerhouse II, Building 2

Coal/Natural Gas fired boilers

(d) The two (2) coal and natural gas fired boilers that are located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-001	BW1-BOILER	B&W #1 BOILER Coal fired (natural gas is used for igniter)	Fabric Filter	None	249 MMBtu/hr	1979
01-001	BW2-BOILER	B&W #2 BOILER Coal fired (natural gas is used for igniter)	Fabric Filter	None	249 MMBtu/hr	1979

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.3.1 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-1]

Pursuant to 326 IAC 6-2-1(g) and PC (65) 2014, Condition (f), issued on January 23, 1978, particulate emissions shall be limited to 0.10 pounds per MMBtu of heat input for each of BW1-BOILER and BW2-BOILER.

D.3.2 Sulfur Dioxide (SO_2) [326 IAC 7-1.1]

Pursuant to 326 IAC 7-1.1-2(a) and the following permit conditions: Condition (e) of PC (65) 2014, issued on January 23, 1978, Condition 5 of 65-01-94-0211, issued on March 23, 1990, and Condition 5 of 65-01-94-0212, issued on March 23, 1990, and as revised through the Title V permit, the SO_2 emissions from the two (2) coal fired boilers, identified as BW1-BOILER and BW2-BOILER shall each not exceed 2.19 pounds per million Btu (lbs/MMBtu).

D.3.3 [Reserved]

Compliance Determination Requirements

D.3.4 Particulate Control [326 IAC 2-7-6(6)]

In order to demonstrate compliance with 326 IAC 6-2-1 and Condition D.3.1, the emissions from BW1-BOILER and BW2-BOILER shall be directed to the filters used for particulate control whenever the boilers are in operation.

D.3.5 Continuous Emissions Monitoring [326 IAC 3-5]

Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions) and 326 IAC 2-7-5(3)(A)(ii), a continuous opacity monitoring system, that meets the performance specifications of 326 IAC 3-5-

2, shall be installed on the common stack for BW1-BOILER and BW2-BOILER and shall be calibrated, maintained, and operated for measuring opacity.

D.3.6 Sulfur Dioxide Emissions and Sulfur Content [326 IAC 3] [326 IAC 7-2] [326 IAC 7-1.1-2]

In order to demonstrate compliance with the SO_2 limits pursuant to Condition D.3.2, the Permittee shall demonstrate, using a calendar month average, that the sulfur dioxide emissions do not exceed the equivalent of 2.19 pounds per MMBtu from the two (2) coal and natural gas fired boilers, identified as BW1-BOILER and BW2-BOILER when combusting coal. The Permittee may demonstrate such compliance by using one of the following methods pursuant to 326 IAC 7-2-1(c) and in accordance with procedures specified in 326 IAC 3-7:

(a) Pursuant to 326 IAC 7-2-1(e) and 326 IAC 3-7, coal sampling and analysis data for BW1-BOILER and BW2-BOILER shall be collected as follows:

(1) Coal sampling shall be performed using the methods specified in 326 IAC 3-7-2(a), and sample preparation and analysis shall be performed as specified in 326 IAC 3-7-2(c), (d), and (e); or

(2) Pursuant to 326 IAC 3-7-2(b)(2) and 326 IAC 3-7-3, manual or other non-ASTM automatic sampling and analysis procedures may be used upon a demonstration, submitted to the department for approval, that such procedures provide sulfur dioxide emission estimates representative either of estimates based on coal sampling and analysis procedures specified in 326 IAC 3-7-2 or of continuous emissions monitoring; or

(3) The Permittee shall meet the minimum sampling requirements specified in 326 IAC 3-7-2(b)(3), and sample preparation and analysis shall be performed as specified in 326 IAC 3-7-2(c), (d), and (e).

(b) Upon written notification to IDEM by a facility owner or operator, continuous emission monitoring data collected and reported pursuant to 326 IAC 3-5 may be used as the means for determining compliance with the emission limitations in 326 IAC 7. Upon such notification, the other requirements of 326 IAC 7-2 shall not apply. [326 IAC 7-2-1(g)]

A determination of noncompliance pursuant to any of the methods specified in (a) or (b) above shall not be refuted by evidence of compliance pursuant to the other method.

D.3.7 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

No later than 30 months after issuance of this Part 70 permit T129-6794-00002, in order to demonstrate compliance with Condition D.3.1, the Permittee shall perform PM testing for BW1-BOILER and BW2-BOILER utilizing methods as approved by the Commissioner. PM compliance demonstration testing shall be repeated at least once every three (3) years from the date of the previous compliance demonstration. Testing shall be conducted in accordance with Section C-Performance Testing.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

D.3.8 COM Opacity Readings [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

(a) In the event of a continuous opacity monitor (COM) opacity exceeding twenty percent (20%) average opacity for three (3) consecutive six (6) minute averaging periods, reasonable response steps shall be taken in accordance with Section C - Response to Excursions or Exceedances such that the cause(s) of the excursion are identified and corrected and opacity levels are brought back below twenty percent (20%).

(b) COM opacity readings in excess of twenty percent (20%) but not exceeding the opacity limit for the unit are not a deviation from this permit. Failure to take response steps in

accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(c) The Permittee may request that the IDEM, OAQ approve a different opacity trigger level than the one specified in D.3.8(a) and (b), provided the Permittee can demonstrate, through stack testing or other appropriate means, that a different opacity trigger level is appropriate for monitoring compliance with the applicable particulate matter mass emission limits.

D.3.9 Method 9 Opacity Readings

(a) Whenever a COM is malfunctioning, the Permittee shall follow the procedures in accordance with Section C - Maintenance of Continuous Opacity Monitoring Equipment, until such time that the continuous opacity monitor is back in operation.

(b) Whenever a COM is malfunctioning, reasonable response steps shall be taken in accordance with Section C - Response to Excursions or Exceedances whenever the opacity from a boiler, measured by Method 9, exceeds twenty percent (20%) for any three (3) consecutive six (6) minute average periods. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

D.3.10 Baghouse Parametric Monitoring [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

(a) The Permittee shall record the pressure drop across each baghouse used in conjunction with BW1-BOILER and BW2-BOILER at least once per day when the boilers are in operation. When for any one reading, the pressure drop across the baghouse is outside the normal range of 1.0 and 12.0 inches of water or a range established based upon stack test data, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(b) The instrument used for determining the pressure shall comply with Section C - Instrument Specifications, and shall be calibrated in accordance with the manufacturer's specifications. The specifications shall be available on site.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

D.3.11 Record Keeping Requirements

(a) To document compliance with the SO_2 provisions in Conditions D.3.2 and D.3.6, the Permittee shall maintain records of the information specified in (1) through (5) below. Records maintained for (1) through (5) shall be maintained on a monthly basis and shall be sufficient to establish compliance with the SO_2 emission limits established in Condition D.3.2.

(1) Calendar dates covered in the compliance determination period; and

(2) Actual coal usage since last compliance determination period; and

(3) Sulfur content and heat content; and

(4) Sulfur dioxide emission rates; and

(5) Results of analysis of coal, or vendor analysis of coal and coal supplier certification.

(b) Pursuant to 326 IAC 3-7-5(a), the Permittee shall develop a standard operating procedure (SOP) for BW1-BOILER and BW2-BOILER to be followed for sampling, handling, analysis, quality control, quality assurance, and date reporting of the information collected pursuant to 326 IAC 3-7-2 through 326 IAC 3-7-4. In addition any revision to the SOP shall be submitted to IDEM, OAQ.

(c) To document compliance with Conditions D.3.5 and D.3.8, the Permittee shall maintain records of the continuous opacity monitoring (COM) data in accordance with 326 IAC 3-5. Records shall be sufficient to establish compliance with the limits established in this section. When the COM system is not functioning, the Permittee shall maintain records of opacity readings of the stack exhaust, in accordance with Section C - Maintenance of Continuous Opacity Monitoring Equipment in order to document compliance with Condition D.3.9.

(d) To document compliance with Condition D.3.10, the Permittee shall maintain the daily record of the pressure drop readings across each baghouse required by Condition D.3.10. When a daily reading is not recorded, the Permittee shall maintain records of the reason for the lack of a pressure drop reading (e.g. the process did not operate during that day).

(e) All records required to be maintained by Condition D.3.11 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

D.3.12 Reporting Requirements

(a) A quarterly report of opacity exceedances shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. A report containing the information specified in 326 IAC 3-5-7 may be used to fulfill this requirement. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(b) A quarterly report of the calendar month average coal sulfur content, coal heat content, and sulfur dioxide emission rate in pounds per million Btus for BW1-BOILER and BW2-BOILER and the total monthly coal consumption shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, within thirty (30) days after the end of the quarter being reported. [326 IAC 7-2-1(c)(2]

The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(c) Pursuant to 326 IAC 3-5-7(5), reporting of continuous monitoring system instrument downtime, except for zero (0) and span checks, which shall be reported separately, shall include the following:

(1) Date of downtime.
(2) Time of commencement.
(3) Duration of each downtime.
(4) Reasons for each downtime.
(5) Nature of system repairs and adjustments.

The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(d) The Permittee shall submit the reports and records required to be submitted by Condition D.3.12 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION D.4 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Boilerhouse II, Building 2

Ash Handling

(e) The ash handling equipment located in the Boilerhouse II Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-006	BF-ASVB	BAG FILTER FOR ASH HANDLING SYSTEM	None	Bagfilter	11.3 tons/hr	1979

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
01-005	TRDB	TRIPPER ROOM DUST BLOWER	None	None	30 tons/hr	N/A
01-007	ASVBF	ASH SILO BAG FILTER	Bagfilter*	None	11.3 tons/hr	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* There are no control requirements required for the bagfilter associated with stack/vent ID 01-007 because uncontrolled emissions/hour are only about 10 percent of the allowable emissions for this emission unit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.4.1 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from BF-ASVB, TRDB, and ASVBF shall not exceed the emission rate calculated using the following equation:

$$E = 4.10\ P^{0.67}$$

where E = rate of emission in pounds per hour;
and P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for these emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
01-006	BF-ASVB	11.3	20.8
01-005	TRDB	30	40.0
01-007	ASVBF	11.3	20.8

(b) Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from any process not exempt under 326 IAC 6-3-1(b) or (c) which has a maximum process weight rate less than 100 pounds per hour and the methods in 326 IAC 6-3-2(b) through (d) do not apply shall not exceed 0.551 pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

D.4.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with 326 IAC 6-3-2 and Condition D.4.1, the bagfilter associated with the facility BF-ASVB shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

D.4.3 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust from the filter associated with BF-ASVB (01-006) shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhaust from the filter associated with BF-ASVB, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that does not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

D.4.4 Record Keeping Requirements

(a) To document compliance with Condition D.4.3, the Permittee shall maintain the weekly record of the visible emission notations required by Condition D.4.3(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition D.4.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Section D consists of the following Sections: D.1, D.2, D.3, D.4, two (2) Part 70 Usage Reporting Forms, and two (2) Part 70 Quarterly Reporting Forms.

Condition D.4.4 concludes the Section D requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition D.2.1(b)
Facility: Vent 01-014; BW GAS
Parameter: NO_x
Limit: 39 tons per 365 day rolled on a daily basis and 0.20 lb/MMBtu

Month: _____ **Year:** _____

Day	Natural Gas Used (Mscf)	Avg. NOx (lb/MMBtu)	NOx Emitted Today (Tons)	365 Rolling Total (Tons)	Day	Natural Gas Used (Mscf)	Avg. NOx (lb/MMBtu)	NOx Emitted Today (Tons)	365 Rolling Total (Tons)
1					17				
2					18				
3					19				
4					20				
5					21				
6					22				
7					23				
8					24				
9					25				
10					26				
11					27				
12					28				
13					29				
14					30				
15					31				
16					no. of deviations				

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition D.2.1(c)
Facility: Vent 01-100; H BOILER
Parameter: NO_x
Limit: 39 tons per 365 day rolled on a daily basis and 0.20 lb/MMBtu

Month: _____ **Year:** _____

Day	Natural Gas Used (Mscf)	Avg. NOx (lb/MMBtu)	NOx Emitted Today (Tons)	365 Rolling Total (Tons)	Day	Natural Gas Used (Mscf)	Avg. NOx (lb/MMBtu)	NOx Emitted Today (Tons)	365 Rolling Total (Tons)
1					17				
2					18				
3					19				
4					20				
5					21				
6					22				
7					23				
8					24				
9					25				
10					26				
11					27				
12					28				
13					29				
14					30				
15					31				
16					no. of deviations				

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition D.3.2
Facility: Vent 01-001, BW1-BOILER
Parameter: SO_2
Limits: 2.19 lbs SO_2 per million Btu heat input

Year: _____ **Quarter:** _____

Month	Sulfur Content (%)	Coal Heat Content (Btu/lb)	Coal usage (ton/month)	SO_2 Emissions (lb/MMBTU)

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition D.3.2
Facility: Vent 01-001, BW2-BOILER
Parameter: SO_2
Limits: 2.19 lbs SO_2 per million Btu heat input

Year: _____ Quarter: _____

Month	Sulfur Content (%)	Coal Heat Content (Btu/lb)	Coal usage (ton/month)	SO_2 Emissions (lb/MMBTU)

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

SECTION E.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the entire affected source or affected facility subject to the applicable regulation.

(a) The Phenol Chemical Manufacturing Process Unit (PhCMPU) subject to 40 CFR 63, Subpart F, G, and H is identified by its primary product, which is Phenol. The PhCMPU consists of equipment assembled and connected by pipes or ducts to process raw materials and to manufacture Phenol. A chemical manufacturing process unit consists of more than one unit operation. The PhCMPU includes air oxidation reactors and their associated product separators and recovery devices; reactors and their associated product separators and recovery devices; distillation units and their associated distillate receivers and recovery devices; associated unit operations; associated recovery devices; and any feed, intermediate and product storage vessels, product transfer racks, and connected ducts and piping. A chemical manufacturing process unit includes pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, instrumentation systems, and control devices or systems.

(b) PhD-285, in which Phenol and Acetone are formed, is an affected facility subject to 40 CFR 60, Subpart RRR. PhD-285 consists of unit operations in which one or more chemicals, or reactants other than air, are combined or decomposed in such a way that their molecular structures are altered and one or more new organic compounds are formed, plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) PhC-650, the cleavage, Acetone, and Phenol distillation unit and recovery system in the Phenol plant, is an affected facility subject to 40 CFR 60, Subpart NNN. PhC-650 consists of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(d) The Phenol Chemical Manufacturing Plant, identified as FF_CMP, is subject to 40 CFR 61, Subpart FF because it is a facility engaged in the production of chemicals by chemical, thermal, physical, or biological processes for use as a product, co-product, by-product, or intermediate.

(e) PhVV is an affected facility in the Phenol Process Unit subject to 40 CFR 60, Subpart VV. PhVV consists of components assembled to produce Phenol and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(f) [Reserved]

Facility Description [326 IAC 2-7-5(15)]: (continued)

(g) The Phenol Area includes a miscellaneous organic chemical manufacturing unit (MCPU) which is part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing unit is identified as PhMON_PCP. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials in 40 CFR 63.2435(b)(1) that are not otherwise exempted from requirements of 40 CFR 63, Subpart FFFF. MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to PhMON_PCP are specified in Section N of this permit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.1.1 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source PhCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.6(e)	Compliance with standards and maintenance requirements
63.6(f)	Compliance with standards and maintenance requirements
63.8(b)	Monitoring requirements
63.8(c)	Monitoring requirements
63.11(a)	Control device requirements
63.12(c)	State authority and delegations

E.1.2 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility PhD-285, PhC-650, and/or PhVV, except as provided pursuant to 40 CFR 63.110(d).

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	PhD-258	PhC-650	PhVV
60.11(a)	Compliance with standards and maintenance requirements	X	X	X
60.11(d)	Compliance with standards and maintenance requirements	X	X	X
60.13(e)	Monitoring requirements	X	X	X

E.1.3 General Provisions Relating to NESHAP [326 IAC 14] [40 CFR 61, Subpart A]

The provisions of 40 CFR 61, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 14, applies to the chemical manufacturing plant FF_CMP except when otherwise specified in 40 CFR 61, Subpart FF.

E.1.4 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subparts F and G]

The table that follows provides the specific applicable emission standards of the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subparts F and G] that apply to the affected source PhCMPU.

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.1(a)	63.102(a)	General Standards
BB.1(a)	63.112(a)	Emission Standard
BB.1(c)	63.112(c)	Emission Standard
BB.1(e)	63.112(e)	Emission Standard
BB.1(f)	63.112(f)	Emission Standard
BB.4(a)	63.132(a)	Process Wastewater Provisions -- General
BB.4(f)	63.132(f)	Process Wastewater Provisions -- General
BB.5(a)	63.150(a)	Emission Averaging Provisions
BB.5(k)	63.150(k)	Emission Averaging Provisions

E.1.5 [Reserved]

E.1.6 National Emissions Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing [40 CFR Part 63, Subpart FFFF]

The requirements of 40 CFR Part 63, Subpart FFFF specified in Section N.1 of this permit apply to the miscellaneous organic chemical manufacturing unit identified as PhMON_PCP.

Compliance Determination Requirements

E.1.7 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows provides performance testing requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source PhCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.7(a)(3)	Performance testing requirements
63.7(e)	Performance testing requirements

E.1.8 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows provides performance testing requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility PhD-285, PhC-650, and PhVV, except as provided pursuant to 40 CFR 63.110(d).

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	PhD-285	PhC-650	PhVV
60.8(a)	Performance tests	X	X	X
60.8(b)	Performance tests	X	X	X
60.8(c)	Performance tests	X	X	X
60.8(d)	Performance tests	X	X	X
60.8(e)	Performance tests	X	X	X
60.8(f)	Performance tests	X	X	X

E.1.9 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subparts F and G]

Pursuant to 40 CFR 63, Subparts F and G, the HON emission point group determination requirements for the affected source PhCMPU are identified in the following table:

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.4(b)	63.103(b)	General Compliance, Reporting, and Recordkeeping Provisions
AA.5	63.107	Identification Of Process Vents Subject To 40 CFR 63, Subpart F
BB.6(a)	63.115(a)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(b)	63.115(b)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(c)	63.115(c)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(d)	63.115(d)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(e)(1)	63.115(e)(1)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(f)	63.115(f)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.7(c)	63.132(c)	Process Wastewater Provisions -- General
BB.8(a)	63.144(a)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations
BB.8(b)	63.144(b)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
BB.8(c)	63.144(c)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations

E.1.10 Methods and Procedures [326 IAC 12] [40 CFR 60, Subpart NNN]

Pursuant to 40 CFR 60, Subpart NNN, test methods and procedures applicable for affected facility PhC-650 are identified in the following table:

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title
HH.3(a)	60.664(a)	Test Methods and Procedures
HH.3(b)	60.664(b)	Test Methods and Procedures
HH.3(d)	60.664(e)	Test Methods and Procedures
HH.3(e)	60.664(f)	Test Methods and Procedures
HH.3(f)	60.664(g)	Test Methods and Procedures
HH.3(g)	60.664(h)	Test Methods and Procedures

E.1.11 Methods and Procedures [326 IAC 14] [40 CFR 61, Subpart FF]

Pursuant to 40 CFR 61, Subpart FF the compliance procedures for the chemical manufacturing plant FF_CMP are identified in the following table:

Section FF Permit Condition	Applicable 40 CFR Part 61, Subpart FF Requirement	Regulatory Citation Title
FF.2(a)	61.355(a)	Test Methods, Procedures, and Compliance Provisions
FF.2(b)	61.355(b)	Test Methods, Procedures, and Compliance Provisions
FF.2(c)	61.355(c)	Test Methods, Procedures, and Compliance Provisions

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.1.12 Record Keeping and Reporting Requirements

(a) The table that follows provides recordkeeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source PhCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.9(b)	Notification requirements
63.10(a)	Recordkeeping and reporting requirements
63.10(d)	Recordkeeping and reporting requirements
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) The table that follows provides recordkeeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility PhD-285, PhC-650, and/or PhVV, except as provided pursuant to 40 CFR 63.110(d).

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	PhD-285	PhC-650	PhVV
60.7(a)	Notification and record keeping	X	X	X
60.7(b)	Notification and record keeping	X	X	
60.7(c)	Notification and record keeping			X
60.7(d)	Notification and record keeping	X	X	
60.7(f)	Notification and record keeping	X	X	X
60.7(g)	Notification and record keeping	X	X	X
60.7(h)	Notification and record keeping	X	X	X

(c) The table that follows provides the specific applicable record keeping and reporting standards of the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subparts F and G] that apply to the affected source PhCMPU.

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.6(b)	63.103(b)	General Compliance, Reporting, and Recordkeeping Provisions
AA.6(c)	63.103(c)	General Compliance, Reporting, and Recordkeeping Provisions
AA.6(d)	63.103(d)	General Compliance, Reporting, and Recordkeeping Provisions
BB.10(e)(2)	63.115(e)(2)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
BB.11(f)	63.117(f)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests
BB.12(f)	63.118(f)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements
BB.13(b)	63.146(b)	Wastewater Provisions: Reporting
BB.14(f)	63.147(f)	Wastewater Provisions: Reporting and Recordkeeping
BB.16(a)	63.151(a)	Initial Notification
BB.17(a)	63.152(a)	General Reporting and Continuous Records
BB.17(b)	63.152(b)	General Reporting and Continuous Records
BB.17(c)	63.152(c)	General Reporting and Continuous Records
BB.17(d)	63.152(d)	General Reporting and Continuous Records
BB.17(e)	63.152(e)	General Reporting and Continuous Records

(d) If a process change is made to the affected source PhCMPU which changes a process vent group status, then the applicable reporting provisions of 40 CFR 63.118(g), (h), (i), (j), and (k) shall apply.

(e) If changes occur to emission points in the affected source, PhCMPU, which affect the Permittee's emission averaging plan, as described in 40 CFR 63.151(i), then the reporting provisions of 63.151(i) shall be followed.

(f) If changes occur to emission points in the affected source, PhCMPU, which are not included in the Permittee's emission averaging plan, as described in 40 CFR 63.151(j), then the reporting provisions of 63.151(j) shall be followed.

(g) If the Permittee requests to monitor an alternative parameter; requests alternatives to the continuous operating parameter monitoring and recordkeeping provisions; or requests additional alternative controls or operating scenarios for the affected source PhCMPU, the applicable reporting provisions of 40 CFR 63.151(f), (g) or (h) shall be followed.

(h) The Permittee shall submit a report according to 40 CFR 61.357(a) for any new source subject to 40 CFR 61, Subpart FF.

(i) If a process change is made to the chemical manufacturing plant, FF_CMP, according to 40 CFR 61.357(b), then the reporting provisions of 61.357(b) shall be followed. If a process change is made to the FF_CMP according to 40 CFR 61.357(c), then the reporting provisions of 61.357(c) shall be followed.

(j) All records required to be maintained by Condition E.1.12 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(k) The Permittee shall submit the reports and records required to be submitted by Condition E.1.12 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.2 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Oxidation Process

(h) The Phenol Oxidation Process consists of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-002	E-244	OXIDATE TK VENT CHILLER	None	E-244 is a recovery device	N/A	1979
03-107*	F-235A/B/C/D	CARBON ADSORBERS	Thermal combustion unit (PhTCU)	F-235A/B/C/D is a recovery device	N/A	1979
03-107*	R-670	DETOX	Thermal combustion unit (PhTCU)	None	N/A	1979
N/A	PhDetox WW	PHENOL DETOX WASTEWATER STREAM	None	None	N/A	N/A
N/A	D285	REACTOR PROCESS VENT	None	None	N/A	N/A

a. Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

* Emissions from the combined oxidizers and oxidate settlers can either be vented directly to the atmosphere, through the carbon adsorbers, or through both the carbon adsorbers and the thermal combustion unit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

(a) Pursuant to PC (65) 1813, Condition 2, issued on December 21, 1989, and revised through the Title V permit, the Phenol Oxidation Process shall be limited as provided below:

(1) Emissions from emission unit E-244 shall not exceed 12.6 tons of VOC per 365-day period, rolled on a daily basis.

(2) Emissions from the combined oxidizers and oxidate settlers shall not exceed 237 tons of VOC per 365-day period, rolled on a daily basis.

Compliance with these limits and Conditions E.3.1, F.4.1, N.2.1, and N.3.1 provide that the net emission increase from the 1989 expansion project (pursuant to PC (65) 1813, issued on December 21, 1989, as amended in this Title V permit) is below PSD significant

emission levels and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

(b) Pursuant to Construction Permit PC (65) 1813, issued on December 21, 1989, Condition 8, as amended by A129-13689-00002, issued on April 26, 2001, and revised through the Title V permit, the nitrogen oxide (NO_x) emissions from the thermal combustion unit (PhTCU) shall be limited to less than 40 tons per 365-day period, rolled on a daily basis. Compliance with these limits will ensure that oxides of nitrogen (NO_x) emissions are less than 40 tons per year and make 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

E.2.2 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subpart G]

(a) Pursuant to 40 CFR 63.112(e), the Permittee shall comply with the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subpart G] by meeting the applicable emission standards and monitoring provisions of 40 CFR 63.113 through 40 CFR 63.118 for the Group 1 process vent, R-670, and the Group 2 process vent, E-244. The table that follows provides the specific applicable control and monitoring provisions of the HON that apply to these process vents and the specific condition number where descriptions of these provisions can be found in Section BB.

(1) Pursuant to 40 CFR 63.113(a)(2), the Group 1 process vent, R-670, is controlled by the Thermal Combustion Unit (PhTCU) to meet these provisions.

(2) Pursuant to 40 CFR 63.113(d), the final recovery device on the Group 2 process vent, E-244, maintains the TRE greater than 1.0 to meet these provisions.

(b) Pursuant to 40 CFR 63.112(f), the Permittee shall comply with the HON for the Group 1 wastewater stream, PhDetox WW, and the Group 2 process vent, F-235 A/B/C/D by using an emissions averaging approach such that the emissions do not exceed the emission rate given by the equation in 40 CFR 63.112(a). The table that follows provides the specific applicable provisions of the HON that apply to PhDetox WW and F-235 A/B/C/D, and the Condition number where descriptions of these provisions can be found in Section BB.

(1) Pursuant to 40 CFR 63.150(e), the Group 1 wastewater stream, PhDetox WW, is not being controlled which generates debits.

(2) Pursuant to 40 CFR 63.150(c)(1), the Group 2 process vent, F-235 A/B/C/D, is being controlled by the PhTCU to generate credits. Pursuant to 40 CFR 63.150(m) in the table that follows, F-235 A/B/C/D is required to comply with the testing, monitoring, recordkeeping, and reporting provisions equivalent to the Group 1 process vent, R-670.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	R-670	E-244	F-235A/B/C/D	PhDetox WW
BB.2(a)	63.113(a)	Process Vent Provisions -- Reference Control Technology	X			
BB.2(d)	63.113(d)	Process Vent Provisions -- Reference Control Technology		X		
BB.2(h)	63.113(h)	Process Vent Provisions -- Reference Control Technology	X			

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	R-670	E-244	F-235A/B/C/D	PhDetox WW
BB.3(a)	63.114(a)	Process Vent Provisions -- Monitoring Requirements	X		X	
BB.3(b)	63.114(b)	Process Vent Provisions -- Monitoring Requirements		X		
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X	X	X	
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X	X	X	
BB.5(m)	63.150(m)	Emissions Averaging Provisions			X	X

(c) To indicate proper operation of the control or recovery device and pursuant to 40 CFR 63.114(e), the Permittee has established the following range, as determined in the stack test or engineering assessment as allowed pursuant to 40 CFR 63.152(b)(2)(ii), for each parameter monitored under 40 CFR 63.114(a) and (b).

Emission Unit	Control or Recovery Device To Be Monitored	Parameter(s) To Monitor	Parameter Range
R-670	Catalytic Incinerator (PhTCU)	1. Upstream Temperature 2. Temperature Difference Across Catalyst Bed	1. ≥ 580°F 2. ≥ 13.6°F
E-244	Condenser (E-244)	Condenser Outlet Temperature	≤ 81°F
F-235 A/B/C/D	Carbon Adsorber (F-235 A/B/C/D)	Methanol Concentration	≤ 170 ppm

E.2.3 Alternative Operating Scenario for E-244 to comply with the HON [326 IAC 20] [40 CFR 63, Subpart G]

Instead of complying with the provisions of Condition E.2.2 for E-244, the Permittee may elect to designate the Group 2 process vent E-244 as a HON Group 1 process vent and comply with the alternative operating scenario of this condition. If this alternative is chosen, then pursuant to 40 CFR 63.113(a)(2), the Permittee shall route the E-244 process vent to the PhTCU in order to reduce emissions of total organic hazardous air pollutants by 98 weight-percent or to a concentration of 20 parts per million by volume, whichever is less stringent. The table that follows provides the specific applicable HON standards and monitoring provisions that apply to this process vent and the condition number where descriptions of the provisions can be found in Section BB.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	Routed to PhTCU
BB.2(a)	63.113(a)	Process Vent Provisions -- Reference Control Technology	X
BB.2(h)	63.113(h)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(a)	63.114(a)	Process Vent Provisions -- Monitoring Requirements	X

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	Routed to PhTCU
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X

E.2.4 VOC Reduction Agreement

Pursuant to Construction Permit PC (65) 1813, issued on December 21, 1989, Conditions 9, 10, and 11 as amended by A129-13689-00002, issued on April 26, 2001, and revised through the Title V permit:

(a) The Permittee shall reduce VOC emissions from the F-235A/B/C/D carbon beds process vent by 1.0 ton per year using the PhTCU in order to offset each 1.0 ton per year increase in NO_x emissions created from using the PhTCU to control F-235A/B/C/D. Only those emissions reductions that are not required to comply with the unit's HON emissions averaging implementation plan shall be available to be used as VOC emission reductions to comply with this requirement. This provision shall not be federally enforceable.

(b) VOC emission reductions used to offset the TCU's NO_x emissions shall not be available for contemporaneous emissions netting under state or federal PSD rules or for offsets under the state and federal nonattainment new source review rules.

(c) Beginning April 22, 2010, the requirements in Conditions E.2.4(a) and E.2.6(d) that are applicable to F-235A/B/C/D, shall no longer be applicable if:

(1) The Permittee provides data to IDEM, OAQ showing that the Detox wastewater stream, identified as PhDetox WW, no longer is a HON Group 1 wastewater stream; and

(2) After reviewing the data, IDEM, OAQ agrees, by issuing a permit modification approving the change.

This provision shall not be federally enforceable.

(d) Notwithstanding that compliance with the source's emissions averaging implementation plan under the HON (40 CFR 63, Subpart F and G) may not require the PhTCU to operate full-time, the Permittee shall operate the PhTCU full-time to reduce VOC emissions from the F-235A/B/C/D carbon beds process vent, subject to the startup/shutdown/malfunction provisions of the HON. This provision shall not be federally enforceable.

E.2.5 VOC Emissions from Synthetic Organic Chemical Manufacturing Industry [326 IAC 12] [40 CFR 60, Subpart RRR]

The Permittee shall comply with the requirements of 40 CFR 60, Subpart RRR for the affected facility D285 as provided in (a) or (b) below:

(a) Pursuant to 40 CFR 60.700(c)(5), Subpart RRR, if the Permittee routes the vent stream from the reactor process vent, identified as D285, to the distillation process, identified as C-650, which is a distillation unit subject to 40 CFR 60 Subpart NNN, and the reactor has no other releases to the air except for a pressure relief valve, then D285 is exempt from all the provisions of Subpart RRR except for 40 CFR 60.705(r).

(b) If this alternative is chosen, the Permittee shall comply with the standards, monitoring, testing, reporting, and recordkeeping requirements in 40 CFR 60, Subpart RRR for the affected facility D285.

Compliance Determination Requirements

E.2.6 Volatile Organic Compounds (VOC) and NO_x Control

(a) Pursuant to PC (65) 1813, Condition 2, the following emission units shall have the controls or recovery devices listed in the table below.

Emission Unit	Stack/Vent ID	Control or Recovery Equipment
Combined oxidizers and oxidate settlers	03-107	F-235A/B/C/D (Carbon Adsorbers)
E-244 (Oxidate Tank Vent Chiller)	03-002	E-244 is the condenser

(b) In order to comply with the VOC limit described in Condition E.2.1(a)(1), the condenser E-244 shall operate at all times the phenol oxidation process is operating. The VOC emissions for each day shall be determined by the equation below and daily emissions summed for the rolling 365-day period.

$$\text{VOC Emissions} \equiv \left[\frac{1\text{ ton}}{2000\text{ lbs}}\right] \times \left[\left(T_{E244} \times EF_{E244}\right)\right]$$

Where:

T_{E244} = Number of hours the process is vented through E-244 per day; the Permittee may presume this value to be 24 for the purpose of this determination; and

EF_{E244} = Emission factor of 0.92 lbs VOC/hr or the emission factor determined in the most recent performance test.

(c) For purposes of determining compliance with Condition E.2.1(a)(2), the Permittee shall sum the VOC emissions during any 365-day period as follows:

$$\text{VOC Emissions} \equiv \left[\frac{1\text{ ton}}{2000\text{ lbs}}\right] \times \left[\left(T_{PhTCU} \times EF_{PhTCU}\right) + \left(T_{CB} \times EF_{CB}\right) + \left(V_{ATM} \times EF_{ATM}\right)\right]$$

Where:

T_{PhTCU} = Number of hours the spent air was vented through both the carbon adsorbers (F-235A/B/C/D) and the thermal combustion unit (PhTCU) during the 365-day period;

EF_{PhTCU} = Emission factor of 0.136 lb VOC/hr or the emission factor determined in the most recent performance test;

T_{CB} = Number of hours the spent air was vented through the carbon adsorbers (F-235A/B/C/D) but not through the thermal combustion unit (PhTCU) operated during the 365-day period;

EF_{CB} = Emission factor of 22.7 lb VOC/hr or the emission factor determined in the most recent performance test;

V_{ATM} = Total amount of spent air flow in standard cubic feet vented directly to the atmosphere during the 365-day period; and

EF_{ATM} = Emission factor of 0.000212 lb VOC/scf air or the emission factor determined in the most recent performance test.

(d) For purposes of determining compliance with Condition E.2.1(b), the Permittee shall use the following equation to determine the NO_x emissions for each day, and then sum the daily emissions for the most recent 365-day period:

$$NO_x \text{ Emissions} \equiv \left[\frac{1 \text{ ton}}{2000 \text{ lbs}}\right] \times \left[\left(\frac{T_{PhTCU}}{24 \text{ hours per day}} \times M_{ammonia} \times EF_{ammonia}\right)\right]$$

Where:

T_{PhTCU} = Number of hours the process is vented through PhTCU each day; the Permittee may presume this value to be 24;

$M_{ammonia}$ = Amount of ammonia, in pounds, added to the Phenol manufacturing oxidation process each day; and

$EF_{ammonia}$ = Emission factor of 0.351 lbs NO_x /lb ammonia or the emission factor determined in the most recent performance test.

E.2.7 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

(a) In order to demonstrate compliance with Condition E.2.1(a)(1), the Permittee shall conduct a performance test to verify the emission factor, EFE244, in Condition E.2.6(b), using methods as approved by the Commissioner, within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002.

(b) In order to demonstrate compliance with Condition E.2.1(a)(2), the Permittee shall conduct VOC performance testing, using methods as approved by the Commissioner, within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002 on the following:

(1) The combined oxidizers and oxidate settlers, to determine the emission factor, EFATM, used during times the spent air is vented directly to the atmosphere. The resulting emission factor from this test shall be used in the equation specified in Condition E.2.6(c);

(2) The carbon adsorbers, F-235A/B/C/D, to determine the emission factor EFCB. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. The resulting emission factor from this test shall be used in the equation specified in Condition E.2.6(c); and

(3) The thermal combustion unit, to determine the emission factor EFPhTCU. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. The resulting emission factor from this test shall be used in the equation specified in Condition E.2.6(c)

(c) In order to demonstrate compliance with Condition E.2.1(b), the Permittee shall conduct a performance test to verify the NO_x emission factor, EFammonia,in Condition E.2.6(d), for the thermal combustion unit using methods as approved by the Commissioner, within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration.

(d) Testing shall be conducted in accordance with Section C - Performance Testing.

E.2.8 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart G]

The HON compliance determination requirements for the Phenol process vent, F-235 A/B/C/D and wastewater stream, PhDetox WW, are identified in the following table.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	F-235A/B/C/D	PhDetox WW
BB.9(f)	63.150(f)	Emissions Averaging Provisions	X	X
BB.9(g)	63.150(g)	Emissions Averaging Provisions		X
BB.9(h)	63.150(h)	Emissions Averaging Provisions	X	

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

E.2.9 Monitoring for Carbon Adsorber

In order to demonstrate compliance with E.2.1(a), the Permittee shall monitor the carbon bed adsorbers controlling VOC emissions from the combined oxidizers and oxidate settlers, identified as F-235A/B/C/D. The monitoring pursuant to 40 CFR 63.114(b), Subpart G, as specified in Condition E.2.2 and detailed in Section BB.3(b)(3), satisfies this requirement. When, for any one daily average reading, the monitoring parameters are outside the normal range established pursuant to 40 CFR 63.114(b), the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C -Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition E.2.1(a) of this permit.

E.2.10 Monitoring for Condensers

In order to demonstrate compliance with E.2.1(a), the Permittee shall monitor the condensers controlling VOC emissions from the emission unit, identified as E-244. The monitoring pursuant to 40 CFR 63.114(b), Subpart G, as specified in Condition E.2.2 and detailed in Section BB.3(b)(2), satisfies this requirement. When, for any one daily average reading, the monitoring parameters are outside the normal range established pursuant to 40 CFR 63.114(b), the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition E.2.1(a) of this permit.

E.2.11 Flow Meter Operation [326 IAC 2-7-5]

The Permittee shall install, calibrate, maintain and operate flow meter(s) to measure the spent air flow rate continuously during periods of startups, shutdowns and any other instance(s) when the carbon beds are bypassed. Within 180 days after issuance of this Part 70 permit T129-6794-00002, in order to demonstrate compliance with Condition E.2.1(a)(2), the Permittee shall submit to IDEM, OAQ a monitoring plan for approval by the Commissioner. The Permittee shall follow the monitoring plan upon submittal to IDEM. If comments are provided by the Commissioner, the Permittee shall revise and submit a new monitoring plan within 30 days of receipt of the comments and the revised plan shall then be implemented by the Permittee.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.2.12 Record Keeping and Reporting Requirements

(a) In order to document compliance with Condition E.2.1(a)(1) and E.2.6(b), the Permittee shall maintain daily records of the following:

(1) The number of hours the process is vented through E-244 each day; the Permittee may presume this to be 24 hours per day; and

(2) The amount of VOCs emitted from E-244, calculated pursuant to Condition E.2.6(b).

(b) In order to document compliance with Condition E.2.1(a)(2) and E.2.6(c), the Permittee shall maintain daily records of the following:

(1) The amount of time, in hours, the spent air from the combined oxidizers and oxidate settlers is vented to the atmosphere, through the carbon adsorbers, and/or through both the carbon adsorbers and the thermal combustion unit;

(2) The total amount of spent air flow, in standard cubic feet, when the combined oxidizers and oxidate settlers are vented directly to the atmosphere; and

(3) The amount of VOCs emitted from the combined oxidizers and oxidate settlers, calculated pursuant to Condition E.2.6(c), and include the amount of VOCs emitted from each type of venting option.

(c) In order to document compliance with Condition E.2.1(b), E.2.4(a) and E.2.6(d) the Permittee shall:

(1) Maintain a record of the number of hours the process is vented through PhTCU each day; the Permittee may presume this to be 24 hours per day;

(2) Monitor and record the rate of ammonia addition to the phenol manufacturing oxidation process at least two (2) times each hour; and

(3) Calculate and maintain records of the VOC emissions reductions generated each day at the F-235A/B/C/D carbon bed process vent based upon the source's calculations of emissions debits and credits pursuant to the source's HON emissions averaging implementation plan, to demonstrate that:

(A) on a calendar year basis, sufficient VOC reductions were generated to offset each ton of the PhTCU's NO_x emissions during the year; and

(B) the VOC emissions reductions used to offset the NO_x emissions were not needed to comply with the source's HON emissions averaging implementation plan.

This provision shall not be federally enforceable.

(d) A quarterly summary of the information to document compliance with Conditions E.2.1(a)(1), E.2.1(a)(2), and E.2.1(b) shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(e) Pursuant to 40 CFR 60.705(r), Subpart RRR and to determine compliance with 40 CFR 60.700(c)(5) as stated in Condition E.2.5, the process design description submitted to IDEM, OAQ on October 2, 1996, must be retained for the life of the process.

(f) Pursuant to 40 CFR 63, Subpart G and to document compliance with Conditions E.2.2 and E.2.8, the Permittee shall keep records and submit reports as specified in the federal citations in the table below as described in Section BB. If the Permittee chooses to comply with the alternative operating scenario by rerouting the emission source E-244 to the existing Thermal Combustion Unit (PhTCU) as described in Condition E.2.3, then the

provisions that are applicable to emission source R-670 shown below, are also applicable to emission source E-244.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	R-670	E-244	F-235A/B/C/D	PhDetox WW
BB.11(a)	63.117(a)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests	X	X	X	
BB.12(a)	63.118(a)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X		X	
BB.12(b)	63.118(b)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements		X		
BB.12(c)	63.118(c)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements		X		
BB.12(f)	63.118(f)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X	X	X	
BB.15(e)	63.150(e)	Emissions Averaging Provisions				X
BB.15(n)	63.150(n)	Emissions Averaging Provisions			X	X
BB.15(o)	63.150(o)	Emissions Averaging Provisions			X	X
BB.17(f)	63.152(f)	General Reporting and Continuous Records	X	X	X	
BB.17(g)	63.152(g)	General Reporting and Continuous Records	X	X	X	

(g) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of the scenario it is operating under as detailed in Condition E.2.3. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(h) All records required to be maintained by Condition E.2.12 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(i) The Permittee shall submit the reports and records required to be submitted by Condition E.2.12 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Distillation Process

(i) The Phenol Distillation Process consists of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-005	C-650	CLEAVAGE, ACETONE & PHENOL DISTILLATION	None	BACT: condensers + scrubber (E-614, E-314, C-650)	N/A	1979
03-006	E-429	AMS TOP COL VENT CHILLER	None	E-429 is a recovery device	N/A	1979
03-007	H-520	NATURAL GAS FIRED HEAVY ENDS COLUMN REBOILER	None	None	7.7 MMBtu/hr	1979

a. Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.3.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to PC (65) 1813, Condition 2, issued on December 21, 1989, and revised through the Title V permit, the following emission units shall be limited as provided below:

(a) Emissions from emission unit C-650 (Cleavage, Acetone and Phenol Distillation), Stack/Vent ID 03-005, shall not exceed 75.5 tons of VOC per 365-day period, rolled on a daily basis.

(b) Any change or modification which increases the VOC emissions of emission unit H-520 (Heavy Ends Column Reboiler), Stack/Vent ID 03-007 to greater than 2.5 tons of VOC per twelve (12) consecutive month period must receive prior approval from IDEM, OAQ.

Compliance with this Condition E.3.1 and Conditions E.2.1(a), F.4.1, N.2.1, and N.3.1 ensures that the net emission increase from the 1989 expansion project (pursuant to PC (65) 1813, issued on December 21, 1989, as amended in this Title V permit) is below PSD significant emission levels and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

E.3.2 Hazardous Air Pollutants (HAPs) [326 IAC 14][326 IAC 20] [40 CFR 63, Subpart F] [40 CFR 63, Subpart G]

(a) Pursuant to 40 CFR 63.112(e), the Permittee shall comply with the HON by meeting the applicable control and monitoring provisions of 40 CFR 63.113 through 40 CFR 63.118 for the Group 2 process vents C-650 and E-429. Pursuant to 40 CFR 63.113(d), the final recovery device on the Group 2 process vents, C-650 and E-429, maintains the TRE greater than 1.0 to meet these provisions. The table that follows provides the specific applicable standards and monitoring provisions of the HON that apply to these process vents and the Condition number where descriptions of the provisions can be found in Section BB. Instead of the provisions listed below, the Permittee may elect the alternative operating scenario for process vents C-650 and E-429 as described in Condition E.3.3.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	C-650	E-429
BB.2(d)	63.113(d)	Process Vent Provisions -- Reference Control Technology	X	X
BB.3(b)	63.114(b)	Process Vent Provisions -- Monitoring Requirements	X	X
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X	X
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X	X

(b) To indicate proper operation of the control or recovery device and pursuant to 40 CFR 63.114(e), the Permittee has established the following range, as determined in the stack test or engineering assessment as allowed pursuant to 40 CFR 63.152(b)(2)(ii), for each parameter monitored under 40 CFR 63.114(a) and (b).

Emission Unit	Control or Recovery Device To Be Monitored	Parameter(s) To Monitor	Parameter Range
C-650	Scrubber (C-650)	1. Temperature of Scrubbing Liquid 2. Specific Gravity of Scrubbing Liquid	1. ≤ 132°F 2. < 1.12 ≥ 0.92
E-429	Condenser (E-429)	Condenser Outlet Temperature	≤ 68°F

E.3.3 Alternative Operating Scenario for C-650 and/or E-429 to comply with HON [326 IAC 20] [40 CFR 63, Subpart G]

Instead of complying with the provisions of Condition E.3.2, the Permittee may elect to designate the Group 2 process vent C-650 and/or E-429 as HON Group 1 process vents and comply with the alternative operating scenario of this condition. If this alternative is chosen, pursuant to 40 CFR 63.113(a)(2), the Permittee shall route the C-650 and/or E-429 process vent to the existing PhTCU in order to reduce emissions of total organic hazardous air pollutants by 98 weight-percent or to a concentration of 20 parts per million by volume, whichever is less stringent. The table that follows provides the specific applicable standards and monitoring provisions of the HON that apply to this process vent and the condition number where a description of the provisions can be found in Section BB.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	C-650 and/or E-429 Routed to PhTCU
BB.2(a)	63.113(a)	Process Vent Provisions -- Reference Control Technology	X
BB.2(h)	63.113(h)	Process Vent Provisions -- Reference Control Technology	X
BB.3(a)	63.114(a)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X

E.3.4 VOC Emissions from Synthetic Organic Chemical Manufacturing Industry [326 IAC 12] [40 CFR 60, Subpart NNN]

Pursuant to 40 CFR 60.660(c)(4), if the Permittee maintains a total resource effectiveness (TRE) greater than 8.0 for the process vent, identified as emission unit C-650, then C-650 is exempt from all provisions of Subpart NNN except for 40 CFR 60.662; 60.664(e), (f), and (g); and 60.665 (h) and (l). In such case, instead of complying with this provision, the Permittee may elect one of the alternative operating scenarios for process vent C-650 as described in Condition E.3.5.

E.3.5 Alternative Operating Scenario for VOC Emissions from Synthetic Organic Chemical Manufacturing Industry [326 IAC 12] [40 CFR 60, Subpart NNN] [40 CFR 63, Subpart G]

Instead of complying with the provisions of Condition E.3.4 for C-650, the Permittee may elect to comply with one of the alternative operating scenarios described in this condition.

(a) If this alternative is chosen, then pursuant to 40 CFR 60.662(c) [described in HH.1(c)], the Permittee shall maintain a total resource effectiveness (TRE) greater than 1.0 for the process vent, identified as emission unit C-650. Pursuant to 40 CFR 63.110(d)(5)(ii)(C), the Permittee shall comply with the relevant HON continuous monitoring of recovery device operating parameters and the associated testing, reporting and recordkeeping as specified in E.3.2 and E.3.11(d). The Permittee shall also comply with the applicable 40 CFR 60, Subpart NNN recordkeeping and reporting as specified in E.3.11(f).

(b) If this alternative is chosen, then pursuant to 40 CFR 60.662(a) [described in HH.1(a)], the Permittee shall route the C-650 process vent to the PhTCU in order to reduce emissions of Volatile Organic Compounds by 98 weight-percent or to a concentration of 20 parts per million by volume, whichever is less stringent. Pursuant to 40 CFR 63.110(d)(4), the Permittee shall comply with the HON instead of the provisions of 40 CFR 60, Subpart NNN. Condition E.3.3 lists the applicable HON provisions.

E.3.6 Particulate Matter (Sources of Indirect Heating) [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4, the PM emissions from reboiler H-520 are limited to 0.16 pounds per million Btu heat input. This limitation was calculated using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}} \qquad \text{Where } Q = 1795.5 \text{ MMBtu/hr}$$

E.3.7 Volatile Organic Compounds (VOC) [326 IAC 8-1-6]

Pursuant to 326 IAC 8-1-6 and PC (65) 1813, issued on December 21, 1989, Condition 1, the Cleavage, Acetone and Phenol distillation processes, identified as emission unit C-650, shall use condensers and a scrubber, which is considered best available control technology (BACT).

Compliance Determination Requirements

E.3.8 Volatile Organic Compounds (VOC) Control

(a) Pursuant to PC (65) 1813, Condition 2, the emission units listed in the table below shall have the controls or recovery devices listed in the table below.

(b) In order to comply with the VOC limits described in Condition E.3.1 and E.3.7, the emission units shall, at all times, use the control or recovery device listed in the table below for VOC emissions.

Emission Unit	Stack/Vent ID	Control or Recovery Equipment
C-650 (Cleavage, Acetone and Phenol Distillation)	03-005	BACT Condensers and Scrubber (E-614, E-314, and C-650)
H-520 (Heavy Ends Column Reboiler)	03-007	Flue Gas Recirculation

(c) For purposes of determining compliance with the VOC limit described in Condition E.3.1(a), the VOC emissions from C-650 emission unit for each day shall be determined by the equation below, and daily emissions summed for the rolling 365-day period.

$$\text{VOC Emissions} \equiv \left[\frac{1\text{ ton}}{2000\text{ lbs}}\right] \times \left[\left(T_{C650} \times EF_{C650}\right)\right]$$

Where:

T_{C650} = Number of hours the process is vented through C-650 per day; the Permittee may presume this value to be 24 for the purpose of this determination; and

EF_{C650} = Emission factor of 3.24 lb VOC/hr or the emission factor determined in the most recent performance test.

If the Permittee elects to route the C-650 process vent to the existing PhTCU, as provided in Condition E.3.3, then operation of the PhTCU in accordance with HON requirements demonstrates compliance with the VOC limit described in Condition E.3.1(a), and the compliance determination using the equation in this condition E.3.8(c), the testing in Condition E.3.9, and the related recordkeeping and reporting in Condition E.3.11(a) and (c) are not required.

E.3.9 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

In order to demonstrate compliance with Condition E.3.1(a), the Permittee shall conduct a VOC performance test to verify the emission factor in Condition E.3.8(c), using methods as approved by the Commissioner, within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

E.3.10 Monitoring for Scrubbers

In order to demonstrate compliance with Condition E.3.1, the Permittee shall monitor the scrubber, C-650, controlling VOC emissions from the cleavage, Acetone and Phenol distillation process, identified also as emission unit C-650. The monitoring pursuant to 40 CFR 63.114(b),

Subpart G, as specified in Condition E.3.2 and detailed in Section BB.2(b)(2), satisfies this requirement. When for any one daily average reading, the monitoring parameters are outside the normal range established pursuant to 40 CFR 63.114(b), the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition E.3.1 of this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.3.11 Record Keeping and Reporting Requirements

(a) In order to document compliance with Condition E.3.1(a), the Permittee shall maintain daily records of the following:

(1) The number of hours the process is vented through C-650 each day; the Permittee may presume this to be 24 hours per day; and

(2) The amount of VOCs emitted from C-650, calculated pursuant to Condition E.3.8(c).

(b) In order to document compliance with Condition E.3.1(b), the Permittee shall maintain monthly records of the amount of VOC emitted from emission unit H-520.

(c) A quarterly summary of the information to document compliance with Condition E.3.1(a) shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(d) Pursuant to 40 CFR 63, Subpart G and to document compliance with Condition E.3.2 or the alternative operating scenario in Condition E.3.3 the Permittee shall keep records and submit reports as specified in the following federal citations as described in Section BB. Pursuant to 40 CFR 63.110(d)(4), the Permittee shall also keep records and submit reports as specified in the following federal citations which are described in Section BB in order to document compliance with the alternative operating scenario as detailed in Condition E.3.5(b).

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	C-650	E-429
BB.11(a)	63.117(a)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests	X	X
BB.11(f)	63.117(f)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests	X	X
BB.12(b)	63.118(b)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X	X
BB.12(c)	63.118(c)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X	X
BB.12(f)	63.118(f)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X	X

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	C-650	E-429
BB.17(f)	63.152(f)	General Reporting and Continuous Records	X	X
BB.17(g)	63.152(g)	General Reporting and Continuous Records	X	X

(e) Pursuant to 40 CFR 60, Subpart NNN and in order to document compliance with Condition E.3.4, the Permittee shall keep records and submit reports as specified in the following federal citations which are described in Section HH.

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title	C-650
HH.4(g)	60.665(h)	Reporting and Recordkeeping Requirements	X
HH.4(i)	60.665(l)	Reporting and Recordkeeping Requirements	X

(f) Pursuant to 40 CFR 63.110(d)(5)(C)(ii) and to document compliance with 40 CFR 60.662(c), as stated in the alternative operating scenario in Condition E.3.5(a), the Permittee shall keep records and submit reports as described in the table of Condition E.3.11(d) and in the following federal citations which are described in Section HH.

Section HH Permit Condition	Applicable 40 CFR Part 60 Requirement	Regulatory Citation Title	C-650
HH.4(a)	60.665(a)	Reporting and Recordkeeping Requirements	X
HH.4(b)	60.665(b)	Reporting and Recordkeeping Requirements	X
HH.4(g)	60.665(h)	Reporting and Recordkeeping Requirements	X
HH.4(h)	60.665(l)	Reporting and Recordkeeping Requirements	X

(g) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of which scenarios it operates under as detailed in Conditions E.3.3 and E.3.5. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(h) All records required to be maintained by Condition E.3.11 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(i) The Permittee shall submit the reports and records required to be submitted by Condition E.3.11 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.4 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Hazardous Waste Boilers

(j) The boilers located in the Phenol Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-008	H-530A*	LIQUID WASTE RESIDUE/GAS FIRED BOILER	None	None	75 mmBtu/hr	1979
03-008	H-530B*	LIQUID WASTE RESIDUE/GAS FIRED BOILER	None	None	75 mmBtu/hr	1982

a. Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

*H-530A and H-530B are each an affected source subject to 40 CFR 63, Subpart EEE and are defined as hazardous waste liquid fuel boilers pursuant to 40 CFR 63.1201.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.4.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

(a) Pursuant to PC (65) 1517, Condition 1, issued on May 3, 1982, the emissions of sulfur dioxide from the H-530B boiler shall be limited to 0.37 pounds per mmBtu and 120 tons per year.

(b) Pursuant to PC (65) 1517, Condition 2, issued on May 3, 1982, the emissions of nitrogen oxides from the H-530B boiler shall be limited to 0.40 pounds per mmBtu and 140 tons per year.

Compliance with these limits and the 325,000 pounds total steam production limit for the Lasker, Vogt, and Erie boilers pursuant to CP 129-5500, Condition 13 issued on September 30, 1996 as stated in Condition K.2.1(b) limits the net increase in sulfur dioxide emissions and nitrogen oxide emissions to below 40 tons per year and renders the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

E.4.2 Particulate Matter (Sources of Indirect Heating) [326 IAC 6-2-3(a)]

Pursuant to 326 IAC 6-2-3 (Particulate Emission Limitations for Sources of Indirect Heating) the PM emissions from boilers H-530A and H-530B shall be limited to 0.22 and 0.19 pounds per MMBtu heat input, respectively.

This limitation is based on the following equation:

$$Pt = \frac{C \times a \times h}{76.5 \times Q^{0.75} \times N^{0.25}}$$

where

C = 50 ug/m3
Pt = emission rate limit (lbs/MMBtu)
Q = 1422.6 MMBtu/hr for H-530A and 1497.6 MMBtu/hr for H-530B
N = 8 stacks
a = plume rise factor (0.8)
h = 163 ft for H-530A and 148 ft for H-530B

E.4.3 General Provisions Relating to HAPs [326 IAC 20-1][40 CFR Part 63, Subpart A] [Table 1 to 40 CFR Part 63, Subpart EEE] [40 CFR 63.1200(c)]

(a) The provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, apply to each affected source, except when otherwise specified by Table 1 to 40 CFR Part 63, Subpart EEE. The Permittee must comply with these requirements on and after the date specified in 40 CFR 63.1206(a)(2).

(b) Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition E.4.9, Notification Requirements.

E.4.4 National Emission Standards for Hazardous Air Pollutants for Hazardous Waste Combustors [40 CFR Part 63, Subpart EEE] [40 CFR 63.1200] [40 CFR 63.1201] [40 CFR 63.1206]

(a) The provisions of 40 CFR Part 63, Subpart EEE (National Emission Standards for Hazardous Air Pollutants for Hazardous Waste Combustors) apply to each affected source. A copy of this rule is available at: http://a257.g.akamaitech.net/7/257/2422/01jan20051800/edocket.access.gpo.gov/2005/pdf/05-18824.pdf. The Permittee must comply with these requirements on and after the date established pursuant to 40 CFR 63.1206(a).

(b) Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition E.4.9, Notification Requirements.

(c) An affected source is each hazardous waste combustor listed in 40 CFR 63.1200 that is used for hazardous waste combustion as defined in 40 CFR 63.1201(a). The emission units identified as H-530A and H-530B are each an affected source subject to 40 CFR 63, Subpart EEE.

(d) Terminology used in this section are defined in the CAA, in 40 CFR Part 63, Section 63.2, and in 40 CFR 63.1201, and are applicable to each affected source.

Compliance Determination Requirements

E.4.5 Sulfur Dioxide Emissions and Sulfur Content

In order to demonstrate compliance with the SO_2 limits pursuant to Condition E.4.1(a), the Permittee shall utilize one of the following options:

(a) Analyze the waste sample to determine the sulfur content of the waste via the procedures in 326 IAC 3-7-4 and as approved by IDEM, OAQ.

(1) Waste samples may be collected from the fuel tank immediately after the fuel tank is filled and before any waste is combusted; or

(2) If a partially empty fuel tank is refilled, a new sample and analysis would be required upon filling; or

(3) If waste is being continuously or intermittently added to the fuel tank while waste from the tank is being combusted, one or more samples shall be collected and analyzed at least once per week that represents material being combusted from the tank.

(b) Compliance may also be determined by conducting a stack test for sulfur dioxide emissions from the seventy-five (75) MMBtu per hour boiler, H-530B, using 40 CFR 60, Appendix A, Method 6 in accordance with the procedures in 326 IAC 3-6.

A determination of noncompliance pursuant to any of the methods specified in (a) or (b) above shall not be refuted by evidence of compliance pursuant to the other method.

E.4.6 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

(a) Within one hundred and eighty (180) days after the effective date of this Part 70 permit T129-6794-00002, and in order to demonstrate compliance with the NO_x limits pursuant to Condition E.4.1(b), the Permittee shall conduct a performance test on boiler H-530B to verify the NO_x emission rates, in lb/mmBtu, using methods approved by the Commissioner.

(b) On or before July 28, 2007, in order to demonstrate compliance with Condition E.4.2, the Permittee shall conduct performance tests on boilers H-530A and H-530B using methods as approved by the Commissioner.

These tests shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

E.4.7 Visible Emissions Notations

(a) Visible emission notations of H-530A and H-530B stack exhausts shall be performed once per day during normal daylight operations when these boilers burn a mixture of hazardous waste and natural gas. A trained employee shall record whether emissions are normal or abnormal. Inability to conduct a visible emission notation because neither H-530A nor H-530B operated during normal daylight hours shall not be a deviation.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhaust from H-530A and H-530B, the Permittee shall take reasonable response steps in accordance with Section C - Response

to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.4.8 Record Keeping and Reporting Requirements

(a) The natural gas boiler certification shall be used for H-530A and H-530B during periods when these boilers burn natural gas only and the Permittee elects not to conduct visible emission (VE) notations. The natural gas certification shall cover the six (6) month periods ending June 30 and December 31. This certificate provides documentation of each time interval when VE notations are not necessary for H-530A and H-530B. For such periods, the natural gas boiler certification shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or its equivalent, within thirty (30) days after the end of the six (6) month period being reported. The natural gas-fired boiler certification does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(b) To document compliance with Condition E.4.1(a) and E.4.5, when burning liquid waste residue, the Permittee shall keep a record of the results of the waste analysis or stack test described in Condition E.4.5.

(c) To document compliance with Condition E.4.7, the Permittee shall maintain the daily record of the visible emission notations required by Condition E.4.7(a). When a daily record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours, the unit did not operate during the week or the process did not burn hazardous waste that day).

(d) All records required to be maintained by Condition E.4.8 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

E.4.9 Notification Requirements [40 CFR 63.1207] [40 CFR 63.1210(d)]
[Table 1 to 40 CFR Part 63, Subpart EEE]

(a) The Permittee must submit the applicable notifications in 40 CFR Part 63, Sections 63.7(b) and (c), 63.8(e)(2), 63.8(f)(4), and 63.9(b) through (e) and (h) by the dates specified in those sections, except as provided in 40 CFR 63.1207, 40 CFR 63.1210, and Table 1 to 40 CFR Part 63, Subpart EEE.

(b) When applicable, the Permittee must perform the initial comprehensive performance test, as provided in 40 CFR 63.1207, by the date established in 40 CFR 63.1207(c) and submit a comprehensive performance test plan 12 months prior to commencing the test. This comprehensive performance test plan must be made available to the public for review no later than 60 calendar days before initiation of the test as described in 40 CFR 63.1207(e)(2).

(c) When applicable, within 90 days of completing the initial comprehensive performance test, the Permittee must submit the notification of compliance required by 40 CFR 63.9(h) to document compliance with the applicable emission standards and continuous monitoring system requirements described in 40 CFR 63.1217(a) and 40 CFR 63.1209. The notification of compliance must contain the information specified in 40 CFR 63.1210(d) and any additional information specified in 40 CFR 63.9(h).

E.4.10 Requirement to Submit a Significant Permit Modification Application [326 IAC 2-7-12] [326 IAC 2-7-5]

The Permittee shall submit an application for a significant permit modification to IDEM, OAQ to include information regarding which compliance option or options will be chosen in the Part 70 permit to comply with 40 CFR 63, Subpart EEE.

(a) The significant permit modification application shall be consistent with 326 IAC 2-7-12, including information sufficient for IDEM, OAQ to incorporate into the Part 70 permit the applicable requirements of 40 CFR 63, Subpart EEE, a description of the affected source and activities subject to the standard, and a description of how the Permittee will meet the applicable requirements of the standard.

(b) The significant permit modification application shall be submitted within 90 days of completing the initial comprehensive performance test.

(c) The significant permit modification application shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

SECTION E.5 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Area Tanks

(k) Tanks located in the Phenol Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-009	V-635	PHENOLIC WATER IMPOUNDMENT TANK/AMS SURGE TANK	None	None	802 m^3	1979
03-010	V-630	DEPHENOLATION FEED TANK	None	None	90 m^3	1979
03-011	D-620	SLOP OIL DRUM	None	None	12.8 m^3	1978
03-013	V-520	OFFSITE AMS STORAGE TANK	None	None	69.7 m^3	1979
03-018	V-704C	CUMENE STORAGE TANK	None	None	10,705 m^3	1978
03-019	V-525A	WASTE HYDROCARBON STORAGE TANK	Condenser or flameless thermal oxidizer	None	558 m^3	1979
03-020	V-704A	CUMENE STORAGE TANK	None	None	10,478 m^3	1978
03-021	V-704B	CUMENE STORAGE TANK	None	None	10,478 m^3	1978
03-024	V-701A	PHENOL STORAGE TANK	None	None	1,873 m^3	1978
03-025	V-701B	PHENOL STORAGE TANK	None	None	1,873 m^3	1978
03-031	V-525B	WASTE HYDROCARBON STORAGE TANK	Condenser or flameless thermal oxidizer	None	558 m^3	1982
N/A	V-310B	Splitter Feed Tank	None	None	1,982 m^3	1988
N/A	V-415B	Crude AMS Tank	None	None	601 m^3	1988
N/A	V-701C	PHENOL STORAGE TANK	None	None	1,929 m^3	1988

Note: The condenser or flameless thermal oxidizer is operated pursuant to RCRA requirements and has no applicable limits or operating requirements under this Part 70 operating permit.

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity [(c)]	Date of Construct
03-027	V-528	SEAL FLUSH TANK	None	None	less than 8 m^3	1988
03-030	V-720	WASTEWATER STORAGE TANK	None	None	3,875 m^3	1990

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Area Tanks

(k) Tanks located in the Phenol Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.5.1 Record Keeping and Reporting Requirements

(a) Pursuant to 326 IAC 12, the Permittee shall maintain records of the dimensions and an analysis showing the capacity of storage tank V-701C. These records shall be maintained for the life of the source.

(b) Pursuant to the definition in 40 CFR 63.111, the Phenol CMPU storage vessels identified as V-701A, V-701B, V-704A, V-704B, V-704C and V-701C are Group 2 storage vessels, therefore, pursuant to 40 CFR 63.119(a) and 63.123(a), the Permittee shall keep readily accessible records showing the dimensions of the storage vessel and an analysis showing the capacity of the storage vessel. This record shall be kept as long as the storage vessel retains Group 2 status and is in operation.

(c) All records required to be maintained by Condition E.5.1 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(d) The Permittee shall submit the reports required to be submitted by Condition E.5.1 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.6 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Heat Exchange System and Transfer Operations

(l) The Phenol heat exchange system located within the PhCMPU is described as the entire recirculating cooling system which is connected to the cooling towers listed as emission units below and identified as PNL CTC1, PNL CTC2, PNL CTC3, PNL CTC 4, and PNL CTC5.

(m) The Phenol transfer operations located within the PhCMPU are identified as emission units PNL TRUCK and PRC below.

(n) The barge loading operation, identified as BARGE, is associated with the phenol plant. The BARGE operation conducts bulk loading of acetone onto marine tank barges, which activity is a marine tank vessel loading operation under 40 CFR 63 Subpart Y. The acetone contains organic HAP only as an "impurity", as defined in 40 CFR 63.561. BARGE is a "source with emissions less than 10 and 25 tons", as defined in 40 CFR 63.561.

Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]
03-032	PNL TRUCK	PHENOL TRUCK LOADING	Scrubber	None
03-033	PRC	PHENOL RAIL CAR LOADING	None	None
03-100	PNL CTC1	PHENOL COOLING TOWER CELL 1	None	None
03-101	PNL CTC2	PHENOL COOLING TOWER CELL 2	None	None
03-102	PNL CTC3	PHENOL COOLING TOWER CELL 3	None	None
03-103	PNL CTC4	PHENOL COOLING TOWER CELL 4	None	None
03-104	PNL CTC5	PHENOL COOLING TOWER CELL 5	None	None
	BARGE	ACETONE BARGE LOADING	None	None

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.6.1 Hazardous Air Pollutants (HAPs) - Heat Exchange System [326 IAC 20] [40 CFR 63, Subpart F]

Pursuant to 40 CFR 63.104(b), the Permittee shall comply with the applicable emission standards and monitoring provisions of 40 CFR 63.104(a) for the Phenol Chemical Manufacturing Process Unit (PhCMPU) heat exchange system by monitoring the Phenol cooling tower system, identified as PNL CTC1, PNL CTC2, PNL CTC3, PNL CTC4, and PNL CTC5, for total hazardous air pollutants, total volatile organic compounds, total organic carbon, one or more speciated HAP compounds, or other representative substances that would indicate the presence of a leak in the heat exchange system. The table that follows provides the specific applicable monitoring

provisions of the HON that apply to this heat exchange system and the specific condition number where descriptions of these provisions can be found in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.2(a)	63.104(a)	Heat Exchange System Requirements
AA.2(b)	63.104(b)	Heat Exchange System Requirements
AA.2(d)	63.104(d)	Heat Exchange System Requirements
AA.2(e)	63.104(e)	Heat Exchange System Requirements

E.6.2 Alternative Operating Scenario for the Phenol Heat Exchange System [326 IAC 20] [40 CFR 63, Subpart F]

Instead of complying with the provisions of Condition E.6.1, the Permittee may elect that the Phenol heat exchange system comply with the alternative operating scenario of this condition. If this alternative is chosen, the Permittee, pursuant to 40 CFR 63.104(c), shall monitor the Phenol heat exchange system for leaks using surrogate indicators for the Phenol cooling tower system, identified as PNL CTC1, PNL CTC2, PNL CTC3, PNL CTC4, and PNL CTC5. The table that follows provides the specific applicable monitoring provisions of the HON that apply to this heat exchange system and the specific condition number where descriptions of these provisions can be found in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.2(a)	63.104(a)	Heat Exchange System Requirements
AA.2(c)	63.104(c)	Heat Exchange System Requirements
AA.2(d)	63.104(d)	Heat Exchange System Requirements
AA.2(e)	63.104(e)	Heat Exchange System Requirements

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.6.3 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 63, Subpart F and to document compliance with Condition E.6.1 or E.6.2, the Permittee shall keep records and submit reports as specified in 40 CFR 63.104(f) [as described in AA.7(f)]. In addition, if the Permittee chooses to comply with the alternative operating scenario in Condition E.6.2 instead of Condition E.6.1, then the Permittee shall also keep records according to 40 CFR 63.104(c) [as described in AA.2(c)].

(b) Pursuant to 40 CFR 63.111, the PhCMPU transfer racks identified as PNL TRUCK and PRC are Group 2 transfer racks, therefore, pursuant to 40 CFR 63.126(c) and 63.130(f), the Permittee shall record and update annually an analysis demonstrating the design and actual annual throughput of the transfer rack and the weight-percent organic HAPs in the liquid loaded. Examples of acceptable documentation for the weight-percent organic HAPs in the liquid loaded include, but are not limited to, analyses representative of the material and engineering calculations.

(c) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of the scenario it operates under as detailed in Condition E.6.2. A summary of these records shall be included with the annual

compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(d) Pursuant to 40 CFR 63.560(a)(3), the Permittee shall retain records of actual throughputs by commodity, as required by 40 CFR 63.567(j)(4).

(e) The Permittee shall retain records sufficient to establish that the HAP in the acetone being loaded into barges is present only as an impurity, as defined in 40 CFR 63.561. Such records will demonstrate that the exemption at 40 CFR 63.560(d)(5) applies, which causes the requirement at 40 CFR 63.565(l) to calculate an annual estimate of HAP emissions to be not applicable.

(f) All records required to be maintained by Condition E.6.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(g) The Permittee shall submit the reports and records required to be submitted by Condition E.6.3 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.7 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Waste

(o) The Phenol area waste is identified as:

(1) A process wastewater stream discarded from the PhCMPU identified as Dephenate Stream which contains a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight; and

(2) HON Maintenance Wastewater, discarded from the PhCMPU that contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G; and

(3) The Benzene containing waste subject to the Benzene Waste Operations NESHAP, 40 CFR 61, Subpart FF, discarded from the Phenol Chemical Manufacturing Plant. FF_CMP identifies the benzene-containing hazardous waste stream(s) generated by the production of chemicals by chemical, thermal, physical, or biological processes for use as a product, co-product, by-product, or intermediate and is either treated, stored, or disposed of.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.7.1 Hazardous Air Pollutants (HAPs) - Maintenance Wastewater [326 IAC 20] [40 CFR 63, Subpart F and G]

Pursuant to 40 CFR 63.105(d) which is described in Condition AA.21(d), the Permittee shall implement the maintenance wastewater procedures described in 40 CFR 63.105(b) and (c) for all maintenance wastewater that contains those organic HAP's listed in table 9 of 40 CFR 63, Subpart G as part of the start-up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3).

E.7.2 Hazardous Air Pollutants (HAPs) - Benzene Containing Waste [326 IAC 14] [40 CFR 61, Subpart FF]

Pursuant to 40 CFR Part 61.342(a), Subpart FF the Permittee shall maintain the total annual benzene quantity from the benzene-containing waste, FF_CMP, to less than 11 tons per year and comply with the following federal citations which are described in Section FF.

Section FF Permit Condition	Applicable 40 CFR Part 61, Subpart FF Requirement	Regulatory Citation Title
FF.1(a)	61.342(a)	Standards: General
FF.1(b)	61.342(g)	Standards: General

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.7.3 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 63.132(c), the PhCMPU process wastewater stream identified as Dephenate Stream is Group 2, therefore, pursuant to 40 CFR 63.132(a)(3), the Permittee shall comply with the applicable recordkeeping requirements specified in 40 CFR

63.146(b)(1) and 63.147(b)(8) for this process wastewater stream. The Permittee shall also maintain documentation pursuant to 63.147(f).

(b) Pursuant to 40 CFR 63.105(a) and to document compliance with Condition E.7.1, the Permittee shall keep records for the maintenance wastewater as specified in the following federal citations and described in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.8(b)	63.105(b)	Maintenance Wastewater Requirements
AA.8(c)	63.105(c)	Maintenance Wastewater Requirements
AA.8(e)	63.105(e)	Maintenance Wastewater Requirements

(c) Pursuant to 40 CFR 61.356(a), and to document compliance with 40 CFR 61.342(a) as stated in Condition E.7.2, the Permittee shall keep records as detailed in 40 CFR 61.356(b) [as described in FF.3] in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. The Permittee shall also submit reports as specified in 40 CFR 61.357(c) [described in FF.4(b)].

(d) All records required to be maintained by Condition E.7.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition E.7.3 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.8 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

Phenol Leak Detection and Repair (LDAR) Components

(p) The Phenol chemical manufacturing process unit (CMPU) consists of equipment subject to LDAR. LDAR applies to Phenol CMPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year and/or volatile organic compound (HAP/VOC) service for any amount of time during the calendar year. In HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. In VOC service means that a piece of equipment either contains or contacts a fluid that is at least 10 percent VOC by weight.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.8.1 Equipment Leaks [326 IAC 12] [40 CFR 60, Subpart VV] [326 IAC 20] [40 CFR 63, Subpart H]

(a) Pursuant to 40 CFR 60, Subpart VV, the Permittee shall control leaks of VOC from the Phenol plant equipment. Pursuant to 40 CFR 63.160(c), the Permittee has elected to apply 40 CFR 63, Subpart H to all Phenol plant equipment subject to Subpart VV. All VOC's in the phenol operations shall be considered, for purposes of applicability and compliance with 40 CFR 63, Subpart H, as if it were organic hazardous air pollutant. Compliance with the provisions of Subpart H listed in Condition E.8.1(b) as detailed in Section CC, shall constitute compliance with 40 CFR part 60, Subpart VV. The Permittee may elect to comply with the alternative operating scenario in E.8.2 for equipment subject to Subpart VV and not Subpart H instead of complying with Subpart H.

(b) Pursuant to 40 CFR 63, Subpart H, the Permittee shall control leaks of HAPs from each pump, compressor, agitator, pressure relief device, sampling connection system, open-ended valve or line, valve, connector, surge control vessel, bottoms receiver, and instrumentation system in organic hazardous air pollutant service; and any control devices or systems required by Subpart H according to the following listed Subpart H requirements which are described in Section CC. Any equipment, as defined in Subpart H, that is intended to operate in organic hazardous air pollutant service for less than 300 hours during the calendar year, or is excluded pursuant to 63.160(e) or (f), is exempt from the provisions of 40 CFR 63 Subpart H.

Section CC Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.1	63.162	Standards: General
CC.2	63.163	Standards: Pumps In Light Liquid Service
CC.3	63.164	Standards: Compressors
CC.4	63.165	Standards: Pressure Relief Devices In Gas/Vapor Service
CC.5	63.166	Standards: Sampling Connection Systems
CC.6	63.167	Standards: Open-Ended Valves or Lines

Section CC Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.7	63.168	Standards: Valves In Gas/Vapor Service and In Light Liquid Service
CC.8	63.169	Standards: Pumps, Valves, Connectors, and Agitators In Heavy Liquid Service; Instrumentation Systems,; and Pressure Relief Devices In Liquid Service
CC.9	63.170	Standards: Surge Control Vessels and Bottoms Receivers
CC.10	63.171	Standards: Delay of Repair
CC.11	63.172	Standards: Closed-Vent Systems and Control Devices
CC.12	63.173	Standards: Agitators In Gas/Vapor Service and In Light Liquid Service
CC.13	63.174	Standards: Connectors In Gas/Vapor Service and In Light Liquid Service
CC.14	63.176	Quality Improvement Program For Pumps
CC.15	63.179	Alternative Means of Emission Limitation: Enclosed-Vented Process Units
CC.16	63.180	Test Methods and Procedures

E.8.2 Alternative Operating Scenario for Equipment Leaks [326 IAC 12] [40 CFR 60, Subpart VV]

Instead of complying with the provisions of Condition E.8.1(a), the Permittee may elect that the Phenol plant equipment, that are not subject to subpart H, comply with the alternative operating scenario of this condition. If this alternative is chosen, the Permittee, shall comply with Subpart VV. Pursuant to 40 CFR 60.482-1, Subpart VV, the Permittee shall control leaks of VOCs from each pump, compressor, pressure relief device, sampling connection system, open-ended valve or line, valve, and flange or other connector in VOC service; and any devices or systems required by Subpart VV according to the following listed in Subpart VV requirements which are described in Section GG.

Section GG Permit Condition	Applicable 40 CFR Part 60, Subpart VV Requirement	Regulatory Citation Title
GG.1	60.482-2	Standards: Pumps in Light Liquid Service
GG.2	60.482-3	Standards: Compressors
GG.3	60.482-4	Standards: Pressure Relief Devices in Gas/Vapor Service
GG.4	60.482-5	Standards: Sampling Connection Systems
GG.5	60.482-6	Standards: Open-Ended Valves or Lines
GG.6	60.482-7	Standards: Valves in Gas/Vapor Service and in Light Liquid Service
GG.7	60.482-8	Standards: Pumps and Valves in Heavy Liquid Service, Pressure Relief Devices in Light Liquid or Heavy Liquid Service, and Connectors
GG.8	60.482-10	Standards: Closed Vent Systems and Control Devices
GG.9	60.482-9	Standards: Delay of Repair
GG.10	60.482-1	Monitoring Requirements
GG.11	60.483-1	Alternative standards for valves-allowable percentage of valves leaking.
GG.12	60.483-2	Alternative standards for valves-skip period leak detection and repair.

Section GG Permit Condition	Applicable 40 CFR Part 60, Subpart VV Requirement	Regulatory Citation Title
GG.13	60.485	Test Methods and Procedures

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

E.8.3 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 63.181, Subpart H and to document compliance with Condition E.8.1, the Permittee shall keep records and submit reports as specified in the following Subpart H applicable requirements which are described in Section CC.

Section CC Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.15	63.181	Recordkeeping Requirements
CC.16	63.182	Reporting Requirements

(b) If the Permittee elects the alternative operating scenario pursuant to 40 CFR 60.480, Subpart VV as stated in Condition E.8.2, the Permittee shall keep records and submit reports as specified in following Subpart VV applicable requirements which are described in Section GG.

Section GG Permit Condition	Applicable 40 CFR Part 60, Subpart VV Requirement	Regulatory Citation Title
GG.14	60.486	Recordkeeping Requirements
GG.15	60.487	Reporting Requirements

(c) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of the scenario it operates under as detailed in Condition E.8.2. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(d) All records required to be maintained by Condition E.8.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition E.8.3 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION E.9 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Phenol, Buildings 40 and 42

<u>Certain liquid streams in open systems</u>

(q) The Phenol chemical manufacturing process units (PhCMPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the PhCMPU components described as:

(1) A drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

E.9.1 Hazardous Air Pollutants (HAPs) [326 IAC 14][326 IAC 20] [40 CFR 63, Subpart F] [40 CFR 63, Subpart G]

(a) Pursuant to 40 CFR 63.149(a), the Permittee shall comply with the control requirements according to 40 CFR 63, Subpart G, Table 35 for any drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute, and the drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the item of equipment is not otherwise exempt from controls by the provisions of 40 CFR 63, subparts A, F, G, or H.

(b) Pursuant to 40 CFR 63.149(a), the Permittee shall comply with the control requirements according to 40 CFR 63, Subpart G, Table 35 for any tank with a capacity of 38 m3 or greater that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute, and the tank is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the tank is not otherwise exempt from controls by the provisions of 40 CFR 63, subparts A, F, G, or H.

Compliance Determination Requirements

E.9.2 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart G]

Pursuant to 40 CFR 63.149(e)(2), the total annual average concentration and annual average flowrate for liquid streams associated with a tank shall be determined at the inlet to the tank and according to the procedures in 40 CFR 63.144(b) and (c).

Section E consists of the following Sections: E.1, E.2, E.3, E.4, E.5, E.6, E.7, E.8, E.9, four (4) Part 70 Quarterly Reporting Forms, and one (1) Part 70 Semi-Annual Natural Gas Fired Boiler Certification Form.

Condition E.9.2 concludes the Section E requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: E-244, Stack/Vent ID 03-002; Condition E.2.1(a)(1)
Parameter: VOC
Limit: 12.6 tons of VOC per 365-day period, rolled on a daily basis

Year: _____ **Quarter:** _____

Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period	Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: Combined Oxidizers and Oxidate Settlers; Condition E.2.1(a)(2)
Parameter: VOC
Limit: 237 tons of VOC per 365-day period, rolled on a daily basis

Year: _____ **Quarter:** _____

Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period	Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: PhTCU; Condition E.2.1(b)
Parameter: NO_x
Limit: Less than 40 tons per 365-day period, rolled on a daily basis

Year: _____ **Quarter:** _____

Day	NO_X Emission this day (ton/day)	NO_X Emissions for the last 365-day period	Day	NO_X Emission this day (ton/day)	NO_X Emissions for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: C-650, Stack/Vent ID 03-005; Condition E.3.1(a)
Parameter: VOC
Limit: 75.5 tons of VOC per 365-day period, rolled on a daily basis

Year: _____ **Quarter:** _____

Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period	Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

PART 70 OPERATING PERMIT
SEMI-ANNUAL NATURAL GAS FIRED BOILER CERTIFICATION

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: H-530A andH-530B

☐ Natural Gas Only
☐ Alternate Fuel burned
From: _____ To: _____

Submitted by:
Signature:
Printed Name:
Title/Position:
Phone:
Date:

Attach a signed certification by the responsible official as defined by 326 IAC 2-7-1(34) to complete this report.

SECTION F.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: BPA, Buildings 15, 31, 56 and 49

BPA Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the affected source or affected facility subject to the applicable regulation.

(a) The BPA Chemical Manufacturing Process Unit (BpaCMPU) subject to 40 CFR 63, Subpart F, G, and H is identified by its primary product, which is Bisphenol-A. The BpaCMPU consists of equipment assembled and connected by pipes or ducts to process raw materials and to manufacture Bisphenol-A. A chemical manufacturing process unit consists of more than one unit operation. The BpaCMPU includes reactors and their associated product separators and recovery devices; distillation units and their associated distillate receivers and recovery devices; associated unit operations; associated recovery devices; and any feed, intermediate and product storage vessels, product transfer racks, and connected ducts and piping. A chemical manufacturing process unit includes pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, instrumentation systems, and control devices or systems.

(b) The affected facilities subject to 40 CFR 60, Subpart NNN are identified as BpaV-6100 and BpaH-383. The affected facilities consist of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) The affected source subject to 40 CFR 63, Subpart NNNNN is identified as BpaNNNNN. The affected source is the group of HCl production facilities in the BPA plant which consist of unit operations and equipment that are associated with the production of liquid HCl product at a concentration of 30 weight percent or greater during normal operations.

(d) BpaVV is an affected facility in the BPA Process Unit subject to 40 CFR 60, Subpart VV. BpaVV consists of components assembled to produce Bisphenol-A and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(e) [Reserved]

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.1.1 General Provisions Relating to NESHAP [326 IAC 20-1][40 CFR Part 63, Subpart A]

(a) The provisions of 40 CFR 63 Subpart A - General Provisions, which are incorporated as 326 IAC 20-1-1, apply to the affected source, as designated by 40 CFR 63.8990(b), except when otherwise specified in 40 CFR 63 Subpart NNNNN. The Permittee must comply with these requirements, as applicable, on and after April 17, 2003.

(b) Since the applicable requirements associated with the compliance options for the existing affected source is not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition F.1.10, National Emission Standards for Hazardous Air Pollutants: Hydrochloric Acid Production - Notification Requirements.

F.1.2 National Emission Standards for Hazardous Air Pollutants: Hydrochloric Acid Production [40 CFR Part 63, Subpart NNNNN]

(a) The affected source is subject to the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Hydrochloric Acid Production, (40 CFR 63, Subpart NNNNN), as of April 17, 2003. Pursuant to 40 CFR 63.8995(b), the Permittee must comply with these requirements on and after April 17, 2006.

(b) The following emissions units comprise the affected source identified as BpaNNNNN, which is subject to 40 CFR 63, Subpart NNNNN:

(1) BpaM308B - emission stream from HCl process vent M308B;
(2) BpaH413 - emission stream from HCl process vent H413;
(3) BpaS1 - emission stream from HCl process vent S1;
(4) BpaHClWW - emission stream from HCl wastewater operations;
(5) BpaHClLDAR - leaks from equipment in HCl service as defined in 40 CFR 63, Subpart NNNNN.

(c) The definitions of 40 CFR 63, Subpart NNNNN at 40 CFR 63.9075 are applicable to the affected source.

(d) Since the applicable requirements associated with the compliance options for the affected source are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition F.1.10, National Emission Standards for Hazardous Air Pollutants: Hydrochloric Acid Production - Notification Requirements.

F.1.3 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source BpaCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.6(e)	Compliance with standards and maintenance requirements
63.6(f)	Compliance with standards and maintenance requirements
63.8(b)	Monitoring requirements
63.8(c)	Monitoring requirements
63.11(a)	Control device requirements
63.12(c)	State authority and delegations

F.1.4 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities BpaV-6100, BpaH-383, and BpaVV.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	BpaV-6100	BpaH-383	BpaVV
60.11(a)	Compliance with standards and maintenance requirements	X	X	X
60.11(d)	Compliance with standards and maintenance requirements	X	X	X
60.13(e)	Monitoring requirements	X	X	X

F.1.5 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subparts F and G]

The table that follows provides the specific applicable emission standards of the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subparts F and G] that apply to the BpaCMPU.

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.1(a)	63.102(a)	General Standards
BB.1(a)	63.112(a)	Emission Standard
BB.1(c)	63.112(c)	Emission Standard
BB.1(e)	63.112(e)	Emission Standard
BB.1(f)	63.112(f)	Emission Standard
BB.4(a)	63.132(a)	Process Wastewater Provisions -- General
BB.4(f)	63.132(f)	Process Wastewater Provisions -- General

F.1.6 [Reserved]

Compliance Determination Requirements

F.1.7 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows provides performance testing requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source BpaCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.7(a)(3)	Performance testing requirements
63.7(e)	Performance testing requirements

F.1.8 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows provides performance testing requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities BpaV-6100, BpaH-383, and BpaVV.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	BpaV-6100	BpaH-383	BpaVV
60.8(a)	Performance tests	X	X	X
60.8(b)	Performance tests	X	X	X
60.8(c)	Performance tests	X	X	X
60.8(d)	Performance tests	X	X	X
60.8(e)	Performance tests	X	X	X
60.8(f)	Performance tests	X	X	X

F.1.9 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subparts F and G]

Pursuant to 40 CFR 63, Subparts F and G, the HON emission point group determination requirements for the affected source, BpaCMPU, are identified in the following table:

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.4(b)	63.103(b)	General Compliance, Reporting, and Recordkeeping Provisions
AA.5	63.107	Identification Of Process Vents Subject To 40 CFR 63, Subpart F
BB.6(a)	63.115(a)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(b)	63.115(b)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(c)	63.115(c)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(d)	63.115(d)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(e)(1)	63.115(e)(1)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.6(f)	63.115(f)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.7(c)	63.132(c)	Process Wastewater Provisions -- General
BB.8(a)	63.144(a)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations
BB.8(b)	63.144(b)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
BB.8(c)	63.144(c)	Process Wastewater Provisions -- Test Methods and Procedures for Determining Applicability and Group 1/Group 2 Determinations

F.1.10 Methods and Procedures [326 IAC 20-11] [40 CFR 60, Subpart NNN]

Pursuant to 40 CFR 60, Subpart NNN, test methods and procedures applicable to affected facilities BpaV-6100 and BpaH-383 are identified in the following table:

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title
HH.3(a)	60.664(a)	Test Methods and Procedures
HH.3(b)	60.664(b)	Test Methods and Procedures
HH.3(d)	60.664(e)	Test Methods and Procedures
HH.3(e)	60.664(f)	Test Methods and Procedures
HH.3(f)	60.664(g)	Test Methods and Procedures
HH.3(g)	60.664(h)	Test Methods and Procedures

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.1.11 National Emission Standards for Hazardous Air Pollutants: Hydrochloric Acid Production - Notification Requirements [40 CFR 63, Subpart NNNNN]

(a) Pursuant to 40 CFR 63.9045, the Permittee shall submit the notifications in 40 CFR 63.7(b) and (c), 63.8(f)(4) and (f)(6), and 63.9(b) through (h) that apply to the affected source by the dates specified. These notifications include, but are not limited to, the following:

(1) An Initial Notification containing the information specified in 40 CFR 63.9(b)(2) was submitted on August 4, 2003, as required by 40 CFR 63.9045(b).

(2) If required to conduct a performance test, a notification of intent to conduct a performance test at least 60 days before the performance test is scheduled to begin as required by 40 CFR 63.7(b)(1) and 40 CFR 63.9045(d).

(3) A Notification of Compliance Status containing the information required by 40 CFR 63.9(h)(2)(ii) in accordance with 40 CFR 63.9045(e). The Notification of Compliance Status must be submitted:

(A) Before the close of business on the 30th day following the completion of the initial compliance demonstration, for each initial compliance demonstration that does not include a performance test.

(B) Before the close of business on the 60th day following the completion of the performance test according to 40 CFR 63.10(d)(2), for each initial compliance demonstration that includes a performance test. The performance test results shall also be submitted.

(4) If required to use a continuous monitoring system (CMS), notifications, as specified in 40 CFR 63.9(g), by the date of submission of the notification of intent to conduct a performance test, as required by 40 CFR 63.7(b).

(b) The notifications required by paragraph (a) shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The notifications require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

F.1.12 Requirement to Submit a Significant Permit Modification Application [326 IAC 2-7-12] [326 IAC 2-7-5]

The Permittee shall submit an application for a significant permit modification to IDEM, OAQ to include information regarding which compliance option or options will be chosen in the Part 70 permit for the affected source.

(a) The significant permit modification application shall be consistent with 326 IAC 2-7-12, including information sufficient for IDEM, OAQ to incorporate into the Part 70 permit the applicable requirements of 40 CFR 63, Subpart NNNNN, a description of the affected source and activities subject to the standard, and a description of how the Permittee will meet the applicable requirements of the standard.

(b) The significant permit modification application shall be submitted no later than the 60th calendar day following the completion of the performance test according to 40 CFR 63.10(d)(2).

(c) The significant permit modification application shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

F.1.13 Record Keeping and Reporting Requirements

(a) The table that follows provides recordkeeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source BpaCMPU, except as provided in 40 CFR 63.103(a) and Table 3 of 40 CFR 63, Subpart F.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements
63.9(b)	Notification requirements
63.10(a)	Recordkeeping and reporting requirements

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.10(d)	Recordkeeping and reporting requirements
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) The table that follows provides record keeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities BpaV-6100, BpaH-383 and BpaVV.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	BpaV-6100	BpaH-383	BpaVV
60.7(a)	Notification and record keeping	X	X	X
60.7(b)	Notification and record keeping	X	X	
60.7(c)	Notification and record keeping			X
60.7(d)	Notification and record keeping	X	X	
60.7(f)	Notification and record keeping	X	X	X
60.7(g)	Notification and record keeping	X	X	X
60.7(h)	Notification and record keeping	X	X	X

(c) The table that follows provides the specific applicable record keeping and reporting standards of the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subparts F and G] that apply to the affected source BpaCMPU.

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
AA.6(b)	63.103(b)	General Compliance, Reporting, and Recordkeeping Provisions
AA.6(c)	63.103(c)	General Compliance, Reporting, and Recordkeeping Provisions
AA.6(d)	63.103(d)	General Compliance, Reporting, and Recordkeeping Provisions
BB.10(e)(2)	63.115(e)(2)	Process Vent Provisions -- Methods and Procedures for Process Vent Group Determinations
BB.11(c)	63.117(c)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests

Section AA or BB Permit Condition	Applicable 40 CFR Part 63, Subpart F or Subpart G Requirement	Regulatory Citation Description
BB.11(f)	63.117(f)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests
BB.13(b)	63.146(b)	Process Wastewater Provisions -- Reporting
BB.14(f)	63.147(f)	Wastewater Provisions: Reporting and Recordkeeping
BB.16(a)	63.151(a)	Initial Notification
BB.17(a)	63.152(a)	General Reporting and Continuous Records
BB.17(b)	63.152(b)	General Reporting and Continuous Records
BB.17(c)	63.152(c)	General Reporting and Continuous Records
BB.17(d)	63.152(d)	General Reporting and Continuous Records
BB.17(e)	63.152(e)	General Reporting and Continuous Records

(d) If a process change is made to the affected source, BpaCMPU, which changes a process vent group status, then the applicable reporting provisions of 40 CFR 63.118(g), (h), (i), (j), and (k) shall apply.

(e) If changes occur to emission points in the affected source, BpaCMPU, which affect the Permittee's emission averaging plan, as described in 40 CFR 63.151(i), then the reporting provisions of 63.151(i) shall be followed.

(f) If changes occur to emission points in the affected source, BpaCMPU, which are not included in the Permittee's emission averaging plan, as described in 40 CFR 63.151(j), then the reporting provisions of 63.151(j) shall be followed.

(g) If the Permittee requests to monitor an alternative parameter; requests alternatives to the continuous operating parameter monitoring and recordkeeping provisions; or requests additional alternative controls or operating scenarios for the affected source, BpaCMPU, the applicable reporting provisions of 40 CFR 63.151(f), (g) or (h) shall be followed.

(h) All records required to be maintained by Condition F.1.13 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(i) The Permittee shall submit the reports and records required to be submitted by Condition F.1.13 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION F.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: BPA, Buildings 15, 31, 56 and 49

BPA Process Operations

(f) The BPA process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-015	V-371	PHENOL VENT HEADER KNOCK OUT TANK IN BPA I & II	V-472 scrubber system	V-371 is recovery device	Less than 40 m^3	1981
04-020	M-450	BPA II VACUUM JET	None	None	N/A	N/A
04-032	M-417	PHENOL VACUUM JET IN BPA II	None	None	N/A	N/A
04-044	M-367	TAR DISTILLATION VACUUM SYSTEM IN BPA I	None	None	N/A	N/A
04-050	H-6060	BPA III VENT INCINERATOR	None	None	N/A	N/A
04-200	M-309	ACID JET IN BPA I	None	None	N/A	N/A
04-201	M-410	ACID JET IN BPA II	None	None	N/A	1975
04-202	M-455	ACID JET IN BPA II	None	None	N/A	N/A
N/A	H-383	TAR CRACKER PHENOL CONDENSER IN BPA I	None	Condenser	N/A	N/A

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-074	V-6100	EXTRACTION KO TANK IN BPA I, II, & III	None	None	Less than 40 m^3	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.2.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

Pursuant to PC (65) 1563, Condition 1(c), issued on September 21, 1984, as revised through the Title V permit, emission unit H-6060 shall not exceed 18 tons of VOC emissions per 365-day period, rolled on a daily basis, such that the total emissions from the 1984 modification has a VOC emission increase of less than 40 tons per year. Compliance with this limit renders the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

F.2.2 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subpart G]

(a) Pursuant to 40 CFR 63.112(e), the Permittee shall comply with the National Emission Standards for Organic Hazardous Air Pollutants from the Synthetic Organic Chemical Manufacturing Industry (HON) [40 CFR 63, Subpart G] by meeting the applicable

emission standards and monitoring provisions of 40 CFR 63.113 through 40 CFR 63.118 for the Group 1 process vent, H-6060, and the Group 2 process vents, V-371, M-450, M-417, M-367, M-309, M-410, M-455, and V-6100. The table that follows provides the specific applicable control and monitoring provisions of the HON that apply to these process vents and the specific condition number where descriptions of these provisions can be found in Section BB.

(1) Pursuant to 40 CFR 63.113(a)(2), the Group 1 process vent, H-6060, is controlled by an incinerator to meet these provisions by reducing emissions of total organic hazardous air pollutants by 98 weight-percent or to a concentration of 20 parts per million by volume.

(2) Pursuant to 40 CFR 63.113(e), the Group 2 process vents, V-371, M-450, M-417, M-367, M-309, M-410, and M-455 maintain a TRE greater than 4.0 to meet these provisions.

(3) Pursuant to 40 CFR 63.113(f), the Group 2 process vent, V-6100, maintains a flow rate less than 0.005 standard cubic meter per minute to meet these provisions. Instead of complying with the provisions listed in the table that follows, the Permittee may elect one of the alternative operating scenarios for process vent V-6100 as described in Condition F.2.3.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	H-6060	V-371	M-450	M-417	M-367	M-309	M-410	M-455	V-6100
BB.2(a)	63.113(a)	Process Vent Provisions -- Reference Control Technology	X								
BB.2(e)	63.113(e)	Process Vent Provisions -- Reference Control Technology		X	X	X	X	X	X	X	
BB.2(f)	63.113(f)	Process Vent Provisions -- Reference Control Technology									X
BB.2(h)	63.113(h)	Process Vent Provisions -- Reference Control Technology	X								
BB.3(a)	63.114(a)	Process Vent Provisions -- Monitoring Requirements	X								
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X								
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X								

(b) To indicate proper operation of the control or recovery device and pursuant to 40 CFR 63.114(e), the Permittee has established the following range, as determined in the stack test or engineering assessment as allowed pursuant to 40 CFR 63.152(b)(2)(ii), for each parameter monitored under 40 CFR 63.114(a) and (b).

Emission Unit	Control or Recovery Device To Be Monitored	Parameter(s) To Monitor	Parameter Range
H-6060	Incinerator (H-6060)	Firebox Temperature	≥ 1492°F

F.2.3 Alternative Operating Scenario for V-6100 to comply with HON [326 IAC 20] [40 CFR 63, Subpart G]

Instead of complying with the provisions of Condition F.2.2(a)(3), the Permittee may elect to comply with one of the alternative operating scenarios described in this condition.

(a) The Permittee may elect to designate the Group 2 process vent V-6100 as a HON Group 1 process vent and comply with the alternative operating scenario of this condition. If this alternative is chosen, then pursuant to 40 CFR 63.113(a)(2), the Permittee shall route the V-6100 process vent to the existing direct flame incinerator identified as H-6060 in order to reduce emissions of total organic hazardous air pollutants by 98 weight-percent or to a concentration of 20 parts per million by volume on a dry basis corrected to 3-percent oxygen, whichever is less stringent. The table that follows provides the specific applicable HON standards and monitoring provisions that apply to this process vent and the condition number where descriptions of the provisions can be found in Section BB; or

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Title	V-6100 Routed to H-6060
BB.2(a)	63.113(a)	Process Vent Provisions -- Reference Control Technology	X
BB.2(h)	63.113(h)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(a)	63.114(a)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(d)	63.114(d)	Process Vent Provisions -- Monitoring Requirements	X
BB.3(e)	63.114(e)	Process Vent Provisions -- Monitoring Requirements	X

(b) If this alternative is chosen, then pursuant to 40 CFR 63.113(e), the Permittee may elect to maintain a total resource effectiveness (TRE) greater than 4.0 for the Group 2 process vent V-6100 and comply with the provisions of calculating a TRE index value in 40 CFR 63.115 and the reporting and recordkeeping provisions in 40 CFR 63.117(b) and 63.118(c).

F.2.4 VOC Emissions from Synthetic Organic Chemical Manufacturing Industry [326 IAC 12] [40 CFR 60, Subpart NNN]

(a) Pursuant to 40 CFR 60.660(c)(6), if the Permittee maintains the flow rate of the Extraction KO Tank, identified as V-6100, to less than 0.008 standard cubic meters per minute, then V-6100 is exempt from all provisions of Subpart NNN except for 40 CFR 60.664(h); and 60.665 (i), (l)(5), and (o). Instead of complying with this provision, the Permittee may elect one of the alternative operating scenarios for process vent V-6100 as described in Condition F.2.5.

(b) Pursuant to 40 CFR 60.660(c)(4), the Permittee shall maintain a total resource effectiveness (TRE) greater than 8.0 for the tar cracker Phenol condenser, identified as emission unit H-383 and is exempt from all provisions of Subpart NNN except for 40 CFR 60.662; 60.664(e), (f), and (g); and 60.665 (h) and (l).

F.2.5 Alternative Operating Scenario for V-6100 to comply with 40 CFR 60, Subpart NNN [326 IAC 12] [40 CFR 60, Subpart NNN]

Instead of complying with the provisions of Condition F.2.4(a), the Permittee may elect to comply with one of the alternative operating scenarios described in this condition.

(a) If this alternative (F.2.5(a)) is chosen, the Permittee may elect to designate the process vent V-6100 as a HON Group 1 process vent and comply with the alternative operating scenario of this condition. If this alternative is chosen, then pursuant to 40 CFR 60.662(a), the Permittee shall route the V-6100 process vent to the existing H-6060 incinerator in order to reduce emissions of Volatile Organic Compounds by 98 weight-percent or to a concentration of 20 parts per million by volume on a dry basis corrected to 3-percent oxygen, whichever is less stringent. Pursuant to 40 CFR 63.110(d)(4), the Permittee shall comply with the HON instead of the provisions of 40 CFR 60, Subpart NNN. Condition F.2.3(a) lists the applicable provisions; or

(b) If this alternative (F.2.5(b)) is chosen, then pursuant to 40 CFR 60.660(c)(4), the Permittee shall maintain a total resource effectiveness (TRE) greater than 8.0 for the process vent V-6100 and be exempt from all provisions of Subpart NNN except for 40 CFR 60.662; 60.664(e), (f), and (g); and 60.665 (h) and (l).

Compliance Determination Requirements

F.2.6 Volatile Organic Compounds (VOC) Control

For purposes of determining compliance with Condition F.2.1, the Permittee shall sum the VOC emissions during any 365-day period as follows:

$$\text{VOC Emissions} \equiv \left[\frac{1\text{ ton}}{2000\text{ lbs}}\right] \times \left[\left(T_{H6060} \times EF_{H6060}\right) + \left(T_{bypass} \times EF_{bypass}\right)\right]$$

Where:

T_{H6060}	=	Number of hours the process vented through H-6060 during the 365-day period;
T_{bypass}	=	Number of hours the process bypassed H-6060 during the 365-day period;
EF_{H6060}	=	Emission factor of 0.024 lb VOC/hour or the emission factor determined in the most recent performance test, when the process is controlled by H-6060; and
EF_{bypass}	=	Emission factor of 1.4 lb VOC/hour or the emission factor determined in the most recent performance test, when the process vent bypasses H-6060.

F.2.7 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

Within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002 and in order to demonstrate compliance with Condition F.2.1, the Permittee shall perform VOC testing as specified in (a) and (b), below, using methods as approved by the Commissioner. Testing shall be conducted in accordance with Section C - Performance Testing.

(a) Test the outlet from H-6060 to determine the emission factor EFH6060 used in the equation specified in Condition F.2.6 during times H-6060 controls the process vent; and

(b) Test the inlet to H-6060 to determine the emission factor EFbypass used in the equation specified in Condition F.2.6 during times the process vent bypasses H-6060.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

F.2.8 Monitoring for Incinerator H-6060

In order to demonstrate compliance with F.2.1, the Permittee shall monitor the incinerator controlling VOC emissions from BPA III, identified as H-6060. The monitoring pursuant to 40 CFR 63.114(a), Subpart G, as specified in Condition F.2.2 and detailed in Section BB.3(a)(1), satisfies this requirement. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the Firebox Temperature is less than the parameter range

established in Condition F.2.2(b), the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition F.2.1 of this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.2.9 Record Keeping and Reporting Requirements

(a) In order to document compliance with Condition F.2.1, the Permittee shall maintain daily records of the following:

(1) The number of hours the process is vented through H-6060 each day; the Permittee may presume this to be 24 hours per day;

(2) The number of hours the process bypassed H-6060 each day; and

(3) The amount of VOCs emitted from H-6060, calculated pursuant to Condition F.2.6, and including the amount of VOCs emitted from each type of venting option.

(b) A quarterly summary of the information to document compliance with Condition F.2.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(c) Pursuant to 40 CFR 63, Subpart G and to document compliance with Condition F.2.2, the Permittee shall keep records and submit reports as specified in the 40 CFR 63, Subpart G applicable requirements in the table below, as described in Section BB.

(1) If the Permittee chooses to comply with the alternative operating scenarios by rerouting the emission unit V-6100 to emission unit H-6060 as described in Condition F.2.3(a) and F.2.5(a), then the provisions that are applicable to emission unit H-6060 shown below, are also applicable to emission unit V-6100. [40 CFR 63.110(d)(4)]

(2) If the Permittee chooses to comply with the alternative operating scenario by maintaining a total resource effectiveness (TRE) greater than 4.0 for the Group 2 process vent V-6100 as described in Condition F.2.3(b), then the provisions that are applicable to emission units V-371, M-450, M-417, M-367, M-309, M-410, and M-455 shown in the table below, are also applicable to emission unit V-6100.

Section BB Permit Condition	Applicable 40 CFR Part 63, Subpart G Requirement	Regulatory Citation Description	H-6060	V-371	M-450	M-417	M-367	M-309	M-410	M-455	V-6100	V-6100 routed to H-6060
BB.11(a)	63.117(a)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests	X									X
BB.11(b)	63.117(b)	Process Vent Provisions -- Reporting and Recordkeeping Requirements for Group and TRE Determinations and Performance Tests		X	X	X	X	X	X	X		
BB.12(a)	63.118(a)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X									X
BB.12(c)	63.118(c)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements		X	X	X	X	X	X	X		
BB.12(d)	63.118(d)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements									X	
BB.12(f)	63.118(f)	Process Vent Provisions -- Periodic Reporting and Recordkeeping Requirements	X									X
BB.17(f)	63.152(f)	General Reporting and Continuous Records	X									X
BB.17(g)	63.152(g)	General Reporting and Continuous Records	X									X

(d) Pursuant to 40 CFR 60, Subpart NNN and in order to document compliance with Condition F.2.4, the Permittee shall keep records and submit reports as specified in the federal citations in the table below as described in Section HH. If the Permittee chooses to comply with the alternative operating scenario by maintaining a total resource effectiveness (TRE) greater than 8.0 for the process vent V-6100 as described in Condition F.2.5(b), then the provisions that are applicable to emission unit H-383 shown in the table below, are also applicable to emission unit V-6100.

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title	V-6100	H-383
HH.4(h)	60.665(h)	Reporting and Recordkeeping Requirements		X
HH.4(i)	60.665(i)	Reporting and Recordkeeping Requirements	X	
HH.4(l)	60.665(l)	Reporting and Recordkeeping Requirements	X	X
HH.4(o)	60.665(o)	Reporting and Recordkeeping Requirements	X	

(e) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of which scenarios it operates as detailed in Conditions F.2.3 and F.2.5. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(f) All records required to be maintained by Condition F.2.9 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(g) The Permittee shall submit the reports and records required to be submitted by Condition F.2.9 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION F.3 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: BPA, Buildings 15, 31, 56 and 49

BPA Flaking, Loading, and Silo Operations

(g) The BPA flaking, loading, and silo operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
04-098	F-231	BPA FLAKER I DUST COLLECTOR IN BPA I & II	None	Bagfilter	12 tons/hr	1990
04-098	F-232	BPA FLAKER II DUST COLLECTOR IN BPA I & II	None	Bagfilter	12 tons/hr	1990

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
04-026	V-701A BF	SILO 701A RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-027	V-339-BF	SILO 339 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-028	V-338-BF	SILO 338 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-029	V-335-BF	SILO 335 RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-030	V-507B-BF	SILO 507B RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-031	V-507A-BF	RECEIVER FOR BPA III STORAGE SILO V-507A IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-034	V-701B-BF	SILO 701B RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-035	V-701C-BF	SILO 701C RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-039	V-701D-BF	SILO 701D RECEIVER IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-040	V-701E-BF	SILO 701E BIN VENT IN BPA I	None	Bagfilter	7.5 tons/hr	N/A
04-064	V-5050-NF	SILO V-5050 RECEIVER (F-5052) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-065	V-5060-NF	SILO V-5060 BIN VENT (F-5062) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-066	F-801D-F	NORTHWEST TRUCK & RAIL LOADING STATION RECEIVER IN BPA II	None	Bagfilter	12 tons/hr	N/A
04-069	B-5030 A	BLOWER (B-5030A) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-070	B-5030 B	BLOWER (B-5030B) IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-083	RRLSF	SOUTHWEST TRUCK & RAIL LOADING STATION RECEIVER IN BPA II	None	Cyclone & Bagfilter	12 tons/hr	N/A
04-086	V-701A-NF	SILO 701A BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-087	V-701B-NF	SILO 701B BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-088	V-701C-NF	SILO 701C BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-089	V-701D-NF	SILO 701D BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-090	V-701E-NF	SILO 701E BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-091	V-338-NF	SILO 338 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-092	V-339-NF	SILO 339 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-093	V-335-NF	SILO 335 BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-094	V-507A-NF	SILO 507A BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-095	V-507B-NF	SILO 507B BIN VENT IN BPA II	None	Bagfilter	7.5 tons/hr	N/A
04-101	TRLSF	EAST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA I	None	Bagfilter	12 tons/hr	N/A
04-207	B-5030S	BPA III SPARE BLOWER	None	Bagfilter	12 tons/hr	N/A
04-208	BPA CLNS1	BPA I/II CLOSED LOOP NITROGEN SYSTEM 1	None	Bagfilter	12 tons/hr	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity(c)	Date of Construct
Insignificant Activities [(d)]						
04-209	BPA CLNS2	BPA I/II CLOSED LOOP NITROGEN SYSTEM 2	None	Bagfilter	12 tons/hr	N/A
04-214	NTRL	NORTHWEST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-215	SWTRL	SOUTHWEST TRUCK AND RAIL LOADING STATION DUST COLLECTOR IN BPA III	None	Bagfilter	12 tons/hr	N/A
04-217	K-701A	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K-701A) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-218	K-701B	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K701B) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-219	K-701C	VACUUM BLOWER FOR TRUCK & RAIL UNLOADING (K-701C) IN BPA I, II, & III	None	Bagfilter	7.5 tons/hr	N/A
04-220/220 A	CLN RCU	CLOSED LOOP NITROGEN RAILCAR UNLOADING	None	Bagfilter	4.5 tons/hr	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.3.1 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
04-026	V-701A BF	7.5	15.8
04-027	V-339-BF	7.5	15.8
04-028	V-338-BF	7.5	15.8
04-029	V-335-BF	7.5	15.8
04-030	V-507B-BF	7.5	15.8
04-031	V-507A-BF	7.5	15.8
04-034	V-701B-BF	7.5	15.8
04-035	V-701C-BF	7.5	15.8
04-039	V-701D-BF	7.5	15.8
04-040	V-701E-BF	7.5	15.8
04-064	V-5050-NF	12	21.7
04-065	V-5060-NF	12	21.7
04-066	F-801D-F	12	21.7
04-069	B-5030 A	12	21.7

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
04-070	B-5030 B	12	21.7
04-083	RRLSF	12	21.7
04-086	V-701A-NF	7.5	15.8
04-087	V-701B-NF	7.5	15.8
04-088	V-701C-NF	7.5	15.8
04-089	V-701D-NF	7.5	15.8
04-090	V-701E-NF	7.5	15.8
04-091	V-338-NF	7.5	15.8
04-092	V-339-NF	7.5	15.8
04-093	V-335-NF	7.5	15.8
04-094	V-507A-NF	7.5	15.8
04-095	V-507B-NF	7.5	15.8
04-098	F-231	12	21.7
04-098	F-232	12	21.7
04-101	TRLSF	12	21.7
04-207	B-5030S	12	21.7
04-208	BPA CLNS1	12	21.7
04-209	BPA CLNS2	12	21.7
04-214	NTRL	12	21.7
04-215	SWTRL	12	21.7
04-217	K-701A	7.5	15.8
04-218	K-701B	7.5	15.8
04-219	K-701C	7.5	15.8
04-220/220A	CLN RCU	4.5	11.2

(b) Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from any process not exempt under 326 IAC 6-3-1(b) or (c) which has a maximum process weight rate less than 100 pounds per hour and the methods in 326 IAC 6-3-2(b) through (d) do not apply shall not exceed 0.551 pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

F.3.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with F.3.1, the bagfilters associated with emission units V-701A-BF, V-339-BF, V-338-BF, V-335-BF, V-507B-BF, V-507A-BF, V-701B-BF, V-701C-BF, V-701D-BF, V-701E-BF, V-5050-NF, V-5060-NF, F-801D-F, B-5030A, B-5030B, RRLSF, V-701A-NF, V-701B-NF, V-701C-NF, V-701D-NF, V-701E-NF, V-338-NF, V-339-NF, V-335-NF, V-507A-NF, V-507B-NF, F-231, F-232, TRLSF, B-5030S, BPA CLNS1, BPA CLNS2, NTRL, SWTRL, K-701A, K-701B, K-701C, and CLN RCU shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-5.1-3(e)(2)] [326 IAC 2-6.1-5(a)(2)]

F.3.3 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust for emission units V-701A-BF, V-339-BF, V-338-BF, V-335-BF, V-507B-BF, V-507A-BF, V-701B-BF, V-701C-BF, V-701D-BF, V-701E-BF, V-5050-NF, V-5060-NF, F-801D-F, B-5030A, B-5030B, RRLSF, V-701A-NF, V-701B-NF, V-701C-NF, V-701D-NF, V-701E-NF, V-338-NF, V-339-NF, V-335-NF, V-507A-NF, V-507B-NF, F-231, F-232, TRLSF, B-5030S, BPA CLNS1, BPA CLNS2, NTRL, SWTRL, K-701A, K-701B, and K-701C shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from V-701A-BF, V-339-BF, V-338-BF, V-335-BF, V-507B-BF, V-507A-BF, V-701B-BF, V-701C-BF, V-701D-BF, V-701E-BF, V-5050-NF, V-5060-NF, F-801D-F, B-5030A, B-5030B, RRLSF, V-701A-NF, V-701B-NF, V-701C-NF, V-701D-NF, V-701E-NF, V-338-NF, V-339-NF, V-335-NF, V-507A-NF, V-507B-NF, F-231, F-232, TRLSF, B-5030S, BPA CLNS1, BPA CLNS2, NTRL, SWTRL, K-701A, K-701B, or K-701C, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.3.4 Record Keeping Requirements

(a) To document compliance with Condition F.3.3, the Permittee shall maintain the weekly record of the visible emission notations required by Condition F.3.3. When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition F.3.4, shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

SECTION F.4 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: BPA, Buildings 15, 31, 56 and 49

BPA Area Tanks

(h) Tanks located in the BPA Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
04-003	V-402	PHENOL STORAGE TANK IN BPA I & II	None	None	2,178 m^3	1974
04-072	V-1010	MIBK STORAGE TANK IN BPA III	None	None	57.5 m^3	1985
04-102	V-7066	50% GLYCOL STORAGE TANK IN BPA III	None	None	48 m^3	1985
N/A	V-1040	PHENOL STORAGE IN BPA III	None	None	267 m^3	1985
N/A	V-1060	STORAGE TANK IN BPA III	None	None	973 m^3	1985
N/A	V-1070	STORAGE TANK IN BPA III	None	None	130 m^3	1984
N/A	V-1090	STORAGE TANK IN BPA III	None	None	267 m^3	1985
N/A	V-221	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-222	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-223	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-224	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-225	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-226	STORAGE TANK IN BPA I & II	None	None	39 m^3	1991
N/A	V-230	STORAGE TANK IN BPA I & II	None	None	41 m^3	1991
N/A	V-3030	STORAGE TANK IN BPA III	None	None	32 m^3	1985
N/A	V-427	STORAGE TANK IN BPA II	None	None	36 m^3	1995
N/A	V-428	STORAGE TANK IN BPA II	None	None	36 m^3	1995
N/A	V-474	STORAGE TANK IN BPA II	None	None	57.6 m^3	1985

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-002	V-401	ACETONE STORAGE TANK IN BPA I & II	None	None	64 m^3	N/A
04-059	V-7090	HOT OIL STORAGE TANK IN BPA III	None	None	22 m^3	N/A
04-061	V-7091	OIL STORAGE TANK IN BPA III	None	None	3.5 m^3	N/A
04-073	V-1080	ACETONE STORAGE TANK IN BPA III	None	None	487 m^3	N/A
04-080	V-1081	ACETONE EXTRACTION TANK IN BPA III	None	None	17 m^3	N/A
04-099	V-250/260	V-250/V-260 HOT OIL STORAGE TANK IN BPA II	H-280 Condenser	None	159 m^3	1991
04-212	V-477	HOT OIL VENT KNOCK OUT TANK BPA I & II	N/A	None	28 m^3	N/A
15-006	V-209	VENT TANK V-209 IN BPA PILOT PLANT	C-294 Scrubber	None	3.4 m^3	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.4.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to PC (65) 1472, Condition 2, issued on July 29, 1980, and revised through the Title V permit the tank V-209 located in the BPA pilot plant shall be limited to 10 tons of VOC emissions per 365-day period, rolled on a daily basis. Compliance with this limit renders the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable. In addition, compliance with this Condition and Conditions E.2.1(a), E.3.1, N.2.1, and N.3.1 ensures that the net emission increase from the 1989 expansion project (pursuant to PC (65) 1813, issued on December 21, 1989, as amended in this Title V permit) is below PSD significant emission levels and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

Compliance Determination Requirements

F.4.2 Volatile Organic Compounds (VOC) Control

Pursuant to PC (65) 1472, Condition 10, issued on July 29, 1980 and revised through the Title V permit, and in order to comply with the VOC limits described in Condition F.4.1, the tank V-209 shall use condensation or a scrubber to control VOC emissions during all periods of operation, except during periods of startup, shutdown, or malfunction.

F.4.3 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

In order to establish an emission factor and demonstrate compliance with Condition F.4.1:

(a) The Permittee shall perform VOC testing for emission unit V-209 using methods as approved by the Commissioner within 180 days after restarting this operation, which is located at the BPA pilot plant. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing. During this test, the Permittee shall measure and record the scrubber liquid feed flow rate and exhaust air stream pressure drop across the scrubber.

(b) The VOC emissions for each day shall be determined by the equation below and daily emissions summed for the rolling 365-day period.

VOC Emissions (ton/day) = (EF_{V209}) x [1 ton/2000 lbs] x [hours of operation/day]

Where:

EF_{V209} = Emission factor of 2.28 lb VOC/hr for V-209 or the emission factor determined in the most recent performance test

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

F.4.4 Monitoring for Scrubbers

(a) The Permittee shall monitor and record the scrubber liquid feed flow rate and exhaust air stream pressure drop across the scrubber at least once every 15 minutes for the scrubber (C-294) controlling VOC emissions from emission unit V-209. This requirement shall not apply during periods when V-209 is not in operation and there are no emissions from V-209. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the flow rate or pressure drop across the scrubber is outside the range as determined in the stack test required by Condition F.4.3, the Permittee shall take reasonable steps in accordance with Section C - Response to Excursions or Exceedances. A flow or pressure drop reading that is outside the normal range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(b) The instruments used for determining flow rate and pressure drop shall comply with Section C - Instrument Specifications, and shall be calibrated in accordance with the manufacturer's specifications. Upon restart of V-209, the specifications shall be available on site with the Preventive Maintenance Plan.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.4.5 Record Keeping and Reporting Requirements

(a) Pursuant to 326 IAC 12, the Permittee shall maintain records of the dimensions and an analysis showing the capacity of storage tanks identified as V-250/260. These records shall be maintained for the life of the source.

(b) Pursuant to 40 CFR 63 Subpart G, Table 5 the BPA CMPU storage vessels identified as V-402, V-1060, V-1010, V-7066, V-1040, V-1070, V-1090 are Group 2 storage vessels, therefore, pursuant to 40 CFR 63.119(a) and 63.123(a), the Permittee shall keep readily accessible records showing the dimensions of the storage vessel and an analysis showing the capacity of the storage vessel. This record shall be kept as long as the storage vessel retains Group 2 status and is in operation.

(c) To document compliance with Condition F.4.4, the Permittee shall maintain records of the scrubber liquid feed flow rate and the exhaust airstream pressure drop across the scrubber which are monitored and recorded for the scrubber controlling emissions from facility V-209.

(d) All records required to be maintained by Condition F.4.5 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition F.4.5 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION F.5 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: BPA, Buildings 15, 31, 56 and 49

BPA Oil Heating Operations

(i) The BPA oil heating operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-100	M-250	HOT OIL FURNACE IN BPA II burns natural gas	None	None	42 MMBtu/hr	1990
04-213	M-475	HOT OIL HEATER IN BPA I & II burns natural gas	None	None	22 MMBtu/hr	1975

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
04-047	M-364	TAR CRACKER OIL HEATER IN BPA I burns natural gas	None	None	4 MMBtu/hr	N/A
04-063	H-7090	BPA III HOT OIL HEATER burns natural gas	None	None	4 MMBtu/hr	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Record Keeping Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.5.1 Record Keeping Requirements

(a) The table that follows provides recordkeeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to M-250 and M-475.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	M-250	M-475
60.7(a)	Notification and record keeping	X	X
60.7(b)	Notification and record keeping	X	X

(b) Pursuant to 40 CFR 60.48c(g), Subpart Dc, the Permittee shall record and maintain records of the amounts of each fuel combusted during each month for emission units M-250 and M-475. If an alternative record keeping requirement is approved by the Administrator in lieu of this condition, the Permittee shall comply with the alternative record keeping requirement upon approval from the Administrator and shall submit an application for a permit modification to IDEM, OAQ to incorporate the approved alternative record keeping into the Part 70 Operating permit.

(c) All records required to be maintained by Condition F.5.1 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

F.5.2 State Only Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units (NSPS) Requirements [326 IAC 12]

Pursuant to 326 IAC 12, the Permittee shall record and maintain records of the amounts of each fuel combusted during each day for emission units M-250 and M-475. This Condition shall no longer apply when the State Implementation Plan's recordkeeping requirement is approved as revised from daily to monthly.

SECTION F.6 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: BPA, Buildings 15, 31, 56 and 49

BPA Heat Exchange System and Area Waste

(j) The BPA heat exchange system located within the BpaCMPU is described as the entire recirculating cooling system which is connected to the cooling towers identified as BPA CTC1, BPA CTC2, and BPA CTC3.

(k) The BPA area waste is identified as:

(1) A process wastewater stream discarded from the BpaCMPU identified as Glitsch Col Stream which contains a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight; and

(2) HON maintenance wastewater discarded from the BpaCMPU that contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.6.1 Hazardous Air Pollutants (HAPs) - Heat Exchange System [326 IAC 20] [40 CFR 63, Subpart F]

Pursuant to 40 CFR 63.104(b), the Permittee shall comply with the applicable emission standards and monitoring provisions of 40 CFR 63.104(a) for the BPA Chemical Manufacturing Process Unit (BpaCMPU) heat exchange system by monitoring the BPA cooling tower system, identified as BPA CTC1, BPA CTC2, and BPA CTC3, for total hazardous air pollutants, total volatile organic compounds, total organic carbon, one or more speciated HAP compounds, or other representative substances that would indicate the presence of a leak in the heat exchange system. The table that follows provides the specific applicable monitoring provisions of the HON that apply to this heat exchange system and the specific condition number where descriptions of these provisions can be found in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title	BPA CMPU	CTC1	CTC2	CTC3
AA.2(a)	63.104(a)	Heat Exchange System Requirements	X	X	X	X
AA.2(b)	63.104(b)	Heat Exchange System Requirements	X	X	X	X
AA.2(d)	63.104(d)	Heat Exchange System Requirements	X	X	X	X
AA.2(e)	63.104(e)	Heat Exchange System Requirements	X	X	X	X

F.6.2 Alternative Operating Scenario for the BPA Heat Exchange System [326 IAC 20] [40 CFR 63, Subpart F]

Instead of complying with the provisions of Condition F.6.1, the Permittee may elect that the BPA heat exchange system comply with the alternative operating scenario of this condition. If this alternative is chosen, the Permittee, pursuant to 40 CFR 63.104(c), shall monitor the BPA heat exchange system for leaks using surrogate indicators for the BPA cooling tower system, identified as BPA CTC1, BPA CTC2, and BPA CTC3. The table that follows provides the specific applicable

monitoring provisions of the HON that apply to this heat exchange system and the specific condition number where descriptions of these provisions can be found in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.2(a)	63.104(a)	Heat Exchange System Requirements
AA.2(c)	63.104(c)	Heat Exchange System Requirements
AA.2(d)	63.104(d)	Heat Exchange System Requirements
AA.2(e)	63.104(e)	Heat Exchange System Requirements

F.6.3 Hazardous Air Pollutants (HAPs) - Maintenance Wastewater [326 IAC 20] [40 CFR 63, Subpart F]

Pursuant to 40 CFR 63.105(d) which is described in Condition AA.21(d), the Permittee shall implement the maintenance wastewater procedures described in 40 CFR 63.105(b) and (c) for all maintenance wastewater that contains those organic HAP's listed in table 9 of 40 CFR 63, Subpart G as part of the start-up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3).

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.6.4 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 63, Subpart F and to document compliance with Condition F.6.1 or F.6.2, the Permittee shall keep records and submit reports as specified in 40 CFR 63.104(f) [as described in AA.7(f)]. In addition, if the Permittee chooses to comply with the alternative operating scenario in Condition F.6.2 instead of Condition F.6.1, then the Permittee shall also keep records according to 40 CFR 63.104(c) [as described in AA.7(c)].

(b) Pursuant to 40 CFR 63.132(c), the BpaCMPU process wastewater stream identified as Glitsch Col Stream is Group 2, therefore, pursuant to 40 CFR 63.132(a)(3), the Permittee shall comply with the applicable recordkeeping requirements specified in 40 CFR 63.146(b)(1) and 63.147(b)(8) for this process wastewater stream. The Permittee shall also maintain documentation pursuant to 40 CFR 63.147(f).

(c) Pursuant to 40 CFR 64.105(a) and to document compliance with Condition F.6.3, the Permittee shall keep records for the maintenance wastewater as specified in the following federal citations and described in Section AA.

Section E Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.8(b)	63.105(b)	Maintenance Wastewater Requirements
AA.8(c)	63.105(c)	Maintenance Wastewater Requirements
AA.8(e)	63.105(e)	Maintenance Wastewater Requirements

(d) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of the scenario it operates under as detailed in Condition F.6.2. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(e) All records required to be maintained by Condition F.6.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(f) The Permittee shall submit the reports and records required to be submitted by Condition F.6.4 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION F.7 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: BPA, Buildings 15, 31, 56 and 49

BPA Leak Detection and Repair (LDAR) Components

(l) The BPA chemical manufacturing process unit (BpaCMPU) consists of equipment subject to LDAR. LDAR applies to the BpaCMPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year and/or volatile organic compound (HAP/VOC) service for any amount of time during the calendar year. In HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. In VOC service means that a piece of equipment either contains or contacts a fluid that is at least 10 percent VOC by weight.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.7.1 Equipment Leaks [326 IAC 12] [40 CFR 60, Subpart VV] [326 IAC 20] [40 CFR 63, Subpart H]

(a) Pursuant to 40 CFR 60, Subpart VV, the Permittee shall control leaks of VOC from the BPA plant equipment. Pursuant to 40 CFR 63.160(c), the Permittee has elected to apply 40 CFR 63, Subpart H to all BPA plant equipment subject to Subpart VV. All VOC's in the BPA operations shall be considered, for purposes of applicability and compliance with 40 CFR 63, Subpart H, as if it were organic hazardous air pollutant. Compliance with the provisions of Subpart H listed in Condition F.7.1(b) as detailed in Section CC, shall constitute compliance with 40 CFR part 60, Subpart VV.

(b) Pursuant to 40 CFR 63, Subpart H, the Permittee shall control leaks of HAPs from each pump, compressor, agitator, pressure relief device, sampling connection system, open-ended valve or line, valve, connector, surge control vessel, bottoms receiver, and instrumentation system in organic hazardous air pollutant service; and any control devices or systems required by Subpart H according to the following listed Subpart H requirements which are in Section CC. Any equipment, as defined in Subpart H, that is intended to operate in organic hazardous air pollutant service for less than 300 hours during the calendar year, or is excluded pursuant to 63.160(e) or (f), is exempt from the provisions of 40 CFR 63 Subpart H.

Section E Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.1	63.162	Standards: General
CC.2	63.163	Standards: Pumps In Light Liquid Service
CC.3	63.164	Standards: Compressors
CC.4	63.165	Standards: Pressure Relief Devices In Gas/Vapor Service
CC.5	63.166	Standards: Sampling Connection Systems
CC.6	63.167	Standards: Open-Ended Valves or Lines
CC.7	63.168	Standards: Valves In Gas/Vapor Service and In Light Liquid Service

Section E Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.8	63.169	Standards: Pumps, Valves, Connectors, and Agitators In Heavy Liquid Service; Instrumentation Systems,; and Pressure Relief Devices In Liquid Service
CC.9	63.170	Standards: Surge Control Vessels and Bottoms Receivers
CC.10	63.171	Standards: Delay of Repair
CC.11	63.172	Standards: Closed-Vent Systems and Control Devices
CC.12	63.173	Standards: Agitators In Gas/Vapor Service and In Light Liquid Service
CC.13	63.174	Standards: Connectors In Gas/Vapor Service and In Light Liquid Service
CC.14	63.176	Quality Improvement Program For Pumps
CC.15	63.179	Alternative Means of Emission Limitation: Enclosed-Vented Process Units
CC.16	63.180	Test Methods and Procedures

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

F.7.2 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 63.181, Subpart H and to document compliance with Condition F.7.1, the Permittee shall keep records and submit reports as specified in the following Subpart H applicable requirements which are described in Section CC.

Section E Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.15	63.181	Recordkeeping Requirements
CC.16	63.182	Reporting Requirements

(b) All records required to be maintained by Condition F.7.2 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit the reports and records required to be submitted by Condition F.7.2 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION F.8 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: BPA, Buildings 15, 31, 56 and 49

Certain liquid streams in open systems

(m) The BPA chemical manufacturing process unit (BpaCMPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the BpaCMPU components described as:

(1) A drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

F.8.1 Hazardous Air Pollutants (HAPs) [326 IAC 14][326 IAC 20] [40 CFR 63, Subpart F] [40 CFR 63, Subpart G]

(a) Pursuant to 40 CFR 63.149(a), the Permittee shall comply with the control requirements according to 40 CFR 63, Subpart G, Table 35 for any drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flowrate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute, and the drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the item of equipment is not otherwise exempt from controls by the provisions of 40 CFR 63, subparts A, F, G, or H.

(b) Pursuant to 40 CFR 63.149(a), the Permittee shall comply with the control requirements according to 40 CFR 63, Subpart G, Table 35 for any tank with a capacity of 38m3 or greater that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute, and the tank is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the tank is not otherwise exempt from controls by the provisions of 40 CFR 63, subparts A, F, G, or H.

Compliance Determination Requirements

F.8.2 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart G]

Pursuant to 40 CFR 63.149(e)(2), the total annual average concentration and annual average flowrate for liquid streams associated with a tank shall be determined at the inlet to the tank and according to the procedures in 40 CFR 63.144(b) and (c).

Section F consists of the following Sections: F.1, F.2, F.3, F.4, F.5, F.6, F.7, F.8, one (1) Part 70 Quarterly Reporting Form.

Condition F.8.2 concludes the Section F requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: H-6060, Stack/Vent ID 04-050; Condition F.2.1
Parameter: VOC
Limit: 18.0 tons of VOC per 365-day period, rolled on a daily basis

Year: _____ Quarter: _____

Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period	Day	VOC Emission this day (ton/day)	VOC Emissions for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

SECTION G.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: LEXAN(c) Resin, Buildings 14 and 16

LEXAN# Resin Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the entire affected source or affected facility subject to the applicable regulation.

(a) The LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) subject to 40 CFR 63, Subpart YY is identified by its primary product, which is polycarbonate. The LxrPPPU includes any equipment, such as a pump, compressor, agitator, pressure relief device, sampling collection system, open-ended valve or line, valve, connector, and instrumentation system in organic hazardous air pollutant service that is assembled and connected by pipes or ducts to process raw and/or intermediate materials to manufacture polycarbonate by interfacial polymerization from bisphenols and phosgene. The LxrPPPU includes the reactor in which phosgene is formed and all equipment downstream of the reactor that provides phosgene for the production of polycarbonate; this part of the LxrPPPU is identified as PhosF-972 and the specific requirements of process vent F-972 can be found in Section I.1.

(b) MeCL_Eq identifies the part of the LEXAN# Resin Polycarbonate Production Process Unit subject to 40 CFR 63, Subparts H and I (MeCL_Eq) because it produces polycarbonates and emits methylene chloride. The MeCL_Eq includes only equipment that is in methylene chloride service. In methylene chloride service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight of methylene chloride. The LxrPPPU includes the MeCL_Eq equipment, but the MeCL_Eq equipment is regulated under 40 CFR 63, Subpart H and I instead of 40 CFR 63, Subpart YY.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.1.1 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source LxrPPPU.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.12(c)	State Authority and Delegations

Compliance Determination Requirements

G.1.2 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart YY]

(a) Pursuant to 40 CFR 63.1104(a), the provisions below set forth calculation and measurement methods for criteria that are required by 40 CFR 63.1103 to be used to determine applicability of control requirements for process vents from continuous unit operations located in the LxrPPPU. The Permittee of a process vent is not required to determine the criteria specified for a process vent that is being controlled in accordance

with the applicable weight-percent, TOC concentration, or organic HAP concentration requirement in 40 CFR 63.1103.

Section DD Permit Condition	Applicable 40 CFR Part 63, Subpart YY Requirement	Regulatory Citation Description
DD.4(a)	63.1104(a)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(b)	63.1104(b)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(c)	63.1104(c)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(e)	63.1104(e)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(f)	63.1104(f)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(g)	63.1104(g)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(h)	63.1104(h)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(j)	63.1104(j)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.4(k)	63.1104(k)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods

(b) The Generic Maximum Achievable Control Technology Standards (GMACT) applicability assessment procedures and methods for the LxrPPPU equipment leaks are identified in the following table.

Section DD Permit Condition	Applicable 40 CFR Part 63, Subpart YY Requirement	Regulatory Citation Description
DD.5(a)	63.1107(a)	Equipment Leaks: Applicability Assessment Procedures and Methods
DD.5(b)	63.1107(b)	Equipment Leaks: Applicability Assessment Procedures and Methods
DD.5(c)	63.1107(c)	Equipment Leaks: Applicability Assessment Procedures and Methods
DD.5(d)	63.1107(d)	Equipment Leaks: Applicability Assessment Procedures and Methods

(c) The GMACT general compliance requirements for the LxrPPPU are identified in the following table.

Section DD Permit Condition	Applicable 40 CFR Part 63, Subpart YY Requirement	Regulatory Citation Description
DD.6(a)	63.1108(a)	Compliance With Standards and Operation and Maintenance Requirements
DD.6(b)	63.1108(b)	Compliance With Standards and Operation and Maintenance Requirements

G.1.3 Performance Test and Compliance Assessment Requirements for Control Devices [40 CFR 63, Subpart SS]

The table that follows provides performance testing requirements of the National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process [40 CFR 63, Subpart SS] that apply to PhosF-972.

Section EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS Requirement	Regulatory Citation Description
EE.9(b)	63.990(b)	Absorbers, Condensers, and Carbon Adsorbers used as Control Devices
EE.10(b)	63.994(b)	Halogen Scrubbers and other Halogen Reduction Devices
EE.11(a)	63.997(a)	Performance Test and Compliance Assessment Requirements for Control Devices
EE.11(b)	63.997(b)	Performance Test and Compliance Assessment Requirements for Control Devices
EE.11(c)	63.997(c)	Performance Test and Compliance Assessment Requirements for Control Devices
EE.11(d)	63.997(d)	Performance Test and Compliance Assessment Requirements for Control Devices
EE.11(e)	63.997(e)	Performance Test and Compliance Assessment Requirements for Control Devices

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

G.1.4 Record Keeping and Reporting Requirements

(a) The table that follows provides recordkeeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source LxrPPPU.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) The table that follows provides the specific applicable record keeping standards of the National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards (GMACT) [40 CFR 63, Subpart YY] that apply to the LxrPPPU. The provisions of 40 CFR 63.1106 apply to 40 CFR 63, Subpart G requirements set forth below.

Section BB, DD or EE Permit Condition	Applicable 40 CFR Part 63, Subpart G, Subpart SS or Subpart YY Requirement	Regulatory Citation Description
BB.13(f)	63.147(f)	Wastewater Provisions: Reporting and Recordkeeping
EE.12(a)	63.998(a)	Recordkeeping Requirements
DD.7(l)	63.1104(l)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.8(a)	63.1109(a)	Recordkeeping Requirements
DD.8(c)	63.1109(c)	Recordkeeping Requirements
DD.8(d)	63.1109(d)	Recordkeeping Requirements
DD.10(a)	63.1111(a)	Startup, Shutdown, and Malfunction

(c) The table that follows provides the specific applicable reporting standards of the National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards (GMACT) [40 CFR 63, Subpart YY] that apply to the LxrPPPU. The provisions of 40 CFR 63.1106 apply to 40 CFR 63 Subpart G requirements set forth below.

Section BB, DD or EE Permit Condition	Applicable 40 CFR Part 63, Subpart G, Subpart SS or Subpart YY Requirement	Regulatory Citation Description
BB.12(b)	63.146(b)	Wastewater Provisions: Reporting
EE.13(a)	63.999(a)	Notification and Other Reports
EE.13(b)	63.999(b)	Notification and Other Reports
EE.13(c)	63.999(c)	Notification and Other Reports
EE.13(d)	63.999(d)	Notification and Other Reports
DD.7(m)	63.1104(m)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods
DD.9(a)	63.1110(a)	Reporting Requirements
DD.9(c)	63.1110(c)	Reporting Requirements
DD.9(d)	63.1110(d)	Reporting Requirements
DD.9(e)	63.1110(e)	Reporting Requirements
DD.9(f)	63.1110(f)	Reporting Requirements
DD.9(g)	63.1110(g)	Reporting Requirements
DD.10(b)	63.1111(b)	Startup, Shutdown, and Malfunction

(d) All records required to be maintained by Condition G.1.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition G.1.4 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION G.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: LEXAN# Resin, Buildings 14 and 16

LEXAN# Resin Process Operations

(c) The LEXAN# Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-007	V-723	RESIN II VENT GAS ABSORBER	None	V-723 is a recovery device	35.82 tons/hour	1991
05-008	F-705	RESIN II V-712 BPA RECEIVER	None	Bagfilter	12.11 tons/hour	1984
05-009	F-706	RESIN II V-713 BPA RECEIVER	None	Bagfilter	12.11 tons/hour	1984
05-013	V-519	RESIN I & II VENT GAS ABSORBER	None	V-519 is a recovery device	35.82 tons/hour	1990
05-016	F-741	RESIN II POST DRYER SURGE HOPPER BIN VENT	None	Bagfilter	30.0 tons/hour	1971

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-004	V-334 BF	TBBPA SILO RECEIVER	None	Bagfilter	7.5 tons/hour	N/A
05-010	F-737	RESIN II WEIGH HOPPER BIN VENT	None	Bagfilter	18.55 tons/hour	N/A
05-011	F-742	RESIN II V-712 BIN VENT	None	Bagfilter	9.28 tons/hour	N/A
05-012	F-743	RESIN II V-713 BIN VENT	None	Bagfilter	9.28 tons/hour	N/A
05-014	F-553	RESIN I BPA RECEIVER FOR V-567	None	Bagfilter	3.76 tons/hour	N/A
05-015	F-515R	RESIN I BPA RECEIVER FOR V-546	None	Bagfilter	3.76 tons/hour	N/A
05-017	V-598	RESIN I V-598 SURGE HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	N/A
05-019	V-508	RESIN I WEIGH HOPPER BIN VENT	None	Bagfilter	7.52 tons/hour	N/A
05-028	F-546	RESIN I V-546 USE BIN VENT	None	Bagfilter	3.76 tons/hour	N/A
05-029	V-567 BF	RESIN I V-567 BPA USE BIN VENT	None	Bagfilter	3.76 tons/hour	N/A
05-030	F-7735	RESIN III INTERMEDIATE SURGE HOPPER BIN VENT	None	Bagfilter	30.0 tons/hour	N/A
05-031	F-7733	RESIN III POST DRYER SURGE HOPPER BIN VENT	None	Bagfilter	30.0 tons/hour	N/A
05-041	V-7756A	RESIN IIA AIR STRIP RECEIVER	None	Bagfilter	10.0 tons/hour	N/A
05-042	V-7756B	RESIN IIB AIR STRIP RECEIVER	None	Bagfilter	10.0 tons/hour	N/A

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FACILITY DESCRIPTIONS: LEXAN# Resin, Buildings 14 and 16

LEXAN# Resin Process Operations

(c) The LEXAN# Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-043	F-7751A	RESIN II A COLUMN HOPPER BIN VENT	None	Bagfilter	10.0 tons/hour	N/A
05-044	F-7751B	RESIN II B COLUMN HOPPER BIN VENT	None	Bagfilter	10.0 tons/hour	N/A
05-045	F-7751C	RESIN II C COLUMN HOPPER BIN VENT	None	Bagfilter	10.0 tons/hour	N/A
05-046	F-5711	RESIN III D DRYER AIR STRIP RECEIVER	None	Bagfilter	10.0 tons/hour	N/A
05-047	F-5705	RESIN III D COLUMN HOPPER BIN VENT	None	Bagfilter	15.0 tons/hour	N/A
05-048	V-7756C	RESIN II C DRYER AIR STRIP RECEIVER	None	Bagfilter	10.0 tons/hour	N/A
05-050	F-5720 BF	RESIN III BPA RECEIVER	None	Bagfilter	9.05 tons/hour	N/A
05-051	F-5722 BF	RESIN III BPA USE BIN VENT	None	Bagfilter	9.05 tons/hour	N/A
05-052	F-5724 BF	RESIN III BPA WEIGH HOPPER BIN VENT	None	Bagfilter	9.05 tons/hour	N/A
05-053	F-5761A	RESIN I A V-5761A COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	N/A
05-054	F-5761B	RESIN I B V-5761B COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	N/A
05-055	F-5761C	RESIN I C V-5761C COLUMN HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	N/A
05-056	F-5776	RESIN I SPECIALS DRYER SCRUBBER	None	Peabody Scrubber	7.5 tons/hour	N/A
05-057	F-5778	RESIN I V-5770 SURGE HOPPER BIN VENT	None	Bagfilter	7.5 tons/hour	N/A
05-058	F-5870	RESIN I SURGE HOPPER RHEOMETER FOR F-5870	None	Vac-U-Max Filter	0.05 tons/hour	N/A
05-059	F-5871	RESIN I SURGE HOPPER RHEOMETER FOR F-5871	None	Vac-U-Max Filter	0.05 tons/hour	N/A
05-060	Z-5873	RESIN I FEED SCRUBBER	Scrubber*	N/A	7.5 tons/hour	N/A
05-061	F-506A	DDDA RECEIVER FOR SILO V-506A	None	Bagfilter	7.5 tons/hour	N/A
05-062	F-506	DDDA RECEIVER	None	Bagfilter	7.5 tons/hour	N/A
05-073	F7737	RESIN III POST DRYER FEED RECEIVER FOR V-7731	None	Bagfilter	30.0 tons/hour	N/A
05-074	F-7736	RESIN III POST DRYER FEED RECEIVER FOR V-749	None	Bagfilter	30.0 tons/hour	N/A
05-075	V-506A	DDDA SILO V-506A UNFILTERED VENT	None	N/A	7.5 tons/hour	N/A
05-150	WPDR1	RESIN I PEABODY SCRUBBER	None	Peabody Scrubber	7.5 tons/hour	N/A
05-151	WPDR2	RESIN II PEABODY SCRUBBER	None	Peabody Scrubber	30.0 tons/hour	N/A

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FACILITY DESCRIPTIONS: LEXAN# Resin, Buildings 14 and 16

LEXAN# Resin Process Operations

(c) The LEXAN# Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-152	WPDR3	RESIN III PEABODY SCRUBBER	None	Peabody Scrubber	15.0 tons/hour	N/A
05-154	FDFS	RESIN III FLASH DRYER FAN SCRUBBER	None	Scrubber	15.0 tons/hour	N/A
05-156	F-5728	SUPERSACK UNLOADER UNIT	None	Bagfilter	7.5 tons/hour	N/A
05-157	F-5723	USE BIN FILTER	None	Bagfilter	7.5 tons/hour	N/A
05-158	CLN TRANS	CLN TRANSFER SYSTEM	None	Bagfilter	7.5 tons/hour	N/A
05-159	F-5786	HI HEAT SURGE BIN SYSTEM	None	Bagfilter	7.5 tons/hour	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* There are no control requirements required for the scrubber associated with stack/vent ID 05-060 because uncontrolled emissions/hour are only about 40 percent of the allowable emissions for this emission unit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit:

(a) Emission units V-723 and V-519 are limited as shown in the table below or by the rate determined in the most recent stack test such that the total VOC emissions from V-723 and V-519, and the COS stream which is described in both Section I.2 and Section K.2 of this permit shall not exceed 55.0 tons per year and the emissions from the 1995 and 1996 resin expansion projects (the COS stream, the resin vent gas absorbers identified as V-723 and V-519, and the emission units included in Sections G.3, H.2, I.1, I.2, I.3, and J.1) shall have an emission increase of less than 40.0 tons VOC per year. This effectively limits the combination of emissions from the resin vent gas absorbers identified as V-723 and V-519, the COS stream, and the other emission units involved in the 1995 and 1996 resin expansion projects (the emission units included in Sections G.2, G.3, H.2, I.1, I.3, and J.1 of this Part 70 permit), to a total of 80.0 tons VOC per year (baseline emissions plus emission increase).

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Emission Unit	Stack/Vent ID	VOC limit (lb VOC/lb Resin)
V-723	05-007	1.29E-05
V-519	05-013	2.84E-05

(b) Any change or modification which increases the total VOC emissions from emission units F-705, F-706, F-737, F-742, F-743, F-515R, F-741, V-598, V-508, F-546, F-7735, F-7733, V-7756A, V-7756B, F-7751A, F-7751B, F-7751C, F-5711, F-5705, V-7756C, F-5720 BF, F-5722 BF, F-5724 BF, F-5761A, F-5761B, F-5761C, F-5776, F-5778, Z-5873, WPDR1, WPDR2, WPDR3, and from the emission units included in Conditions G.3.1, H.2.1, I.1.1, I.3.1 and J.1.1 of this Part 70 permit, to 25.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions G.3.1, H.2.1, I.1.1, I.2.1, I.3.1, J.1.1, and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

G.2.2 Alternative Operating Scenario for V-723 and V-519 to comply with GMACT [326 IAC 20] [40 CFR 63, Subpart SS] [40 CFR 63, Subpart YY]

Pursuant to 40 CFR 63.1104(j), the LxrPPPU process vents, V-723 and V-519 have a TRE index value greater than 4.0; therefore, there are no applicable requirements (or standards) specified in Table 5 of 40 CFR 63.1103(d) for these vents. However, instead of maintaining a TRE index value greater than 4.0 for process vents V-723 and V-519, the Permittee may elect to comply with the alternative operating scenario described in this condition. If this alternative is chosen and the TRE index value for the process vents V-723 and V-519 changes to a value between 2.7 and 4.0, then pursuant to Table 5 of 40 CFR 63.1103(d) the Permittee shall comply with the applicable monitoring and recordkeeping provisions of the National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process [40 CFR 63, Subpart SS]. The process vents, V-723 and V-519, each use an absorber as a recovery device and pursuant to 40 CFR 63.1104(n), shall comply with the monitoring requirements of 40 CFR 63.993(c). The specific applicable control and monitoring requirements in 40 CFR 63, Subparts SS and YY are listed in the table below. This table also provides the specific condition number where descriptions of these provisions can be found in Sections DD and EE.

Section DD or EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS or Subpart YY Requirement	Regulatory Citation Description	V-723	V-519
DD.2(d)	63.1103(d)	Source Category-Specific Applicability, Definitions, and Requirements	X	X
DD.4(n)	63.1104(n)	Process Vents From Continuous Unit Operations: Applicability Assessment Procedures and Methods	X	X
EE.1(e)	63.982(e)	Requirements	X	X
EE.6(a)	63.993(a)	Absorbers, Condensers, Carbon Adsorbers And Other Recovery Devices Used As Final Recovery Devices	X	X
EE.6(c)	63.993(c)	Absorbers, Condensers, Carbon Adsorbers And Other Recovery Devices Used As Final Recovery Devices	X	X

Section DD or EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS or Subpart YY Requirement	Regulatory Citation Description	V-723	V-519
EE.8(b)	63.996(b)	General Monitoring Requirements For Control And Recovery Devices	X	X
EE.8(c)	63.996(c)	General Monitoring Requirements For Control And Recovery Devices	X	X

G.2.3 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the following emission units shall not exceed the calculated rates given in pounds per hour when operating at the maximum process weight rate shown in the table below. The current maximum process weight rate shown is not a limitation. The pounds per hour limitations were calculated using the following equations:

Interpolation of the data for the process weight rate up to 60,000 pounds per hour shall be accomplished by use of the equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

Interpolation and extrapolation of the data for the process weight rate in excess of sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$E = 55.0\ P^{0.11} - 40$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
05-008	F-705	12.11	21.8
05-009	F-706	12.11	21.8
05-016	F-741	30.00	40.0
05-004	V-334 BF	7.50	15.8
05-010	F-737	18.55	29.0
05-011	F-742	9.28	18.2
05-012	F-743	9.28	18.2
05-014	F-553	3.76	9.96
05-015	F-515R	3.76	9.96
05-017	V-598	7.50	15.8
05-019	V-508	7.52	15.8
05-028	F-546	3.76	9.96
05-029	V-567 BF	3.76	9.96
05-030	F-7735	30.00	40.0
05-031	F-7733	30.00	40.0
05-041	V-7756A	10.00	19.2
05-042	V-7756B	10.00	19.2
05-043	F-7751A	10.00	19.2
05-044	F-7751B	10.00	19.2
05-045	F-7751C	10.00	19.2
05-046	F-5711	10.00	19.2
05-047	F-5705	15.00	25.2
05-048	V-7756C	10.00	19.2
05-050	F-5720 BF	9.05	17.9
05-051	F-5722 BF	9.05	17.9
05-052	F-5724 BF	9.05	17.9
05-053	F-5761A	7.50	15.8
05-054	F-5761B	7.50	15.8

Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
05-055	F-5761C	7.50	15.8
05-056	F-5776	7.50	15.8
05-057	F-5778	7.50	15.8
05-060	Z-5873	7.50	15.8
05-061	F-506A	7.50	15.8
05-062	F-506	7.50	15.8
05-073	F7737	30.00	40.0
05-074	F-7736	30.00	40.0
05-075	V-506A	7.50	15.8
05-150	WPDR1	7.50	15.8
05-151	WPDR2	30.00	40.0
05-152	WPDR3	15.00	25.2
05-154	FDFS	15.00	25.2
05-156	F-5728	7.5	15.8
05-157	F-5723	7.5	15.8
05-158	CLN TRANS	7.5	15.8
05-159	F-5786	7.5	15.8

(b) Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission units F-5870 and F-5871 shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

G.2.4 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with G.2.3, the filters on emission units F-705, F-706, F-741, V-334 BF, F-737, F-742, F-743, F-553, F-515R, V-598, V-508, F-546, V-567 BF, F-7735, F-7733, V-7756A, V-7756B, F-7751A, F-7751B, F-7751C, F-5711, F-5705, V-7756C, F-5720 BF, F-5722 BF, F-5724 BF, F-5761A, F-5761B, F-5761C, F-5778, F-5870, F-5871, F-506A, F-506, F7737, F-7736, F-5728, F-5723, CLN TRANS, and F-5786 shall be in operation at all times that material is being transferred into the facility.

G.2.5 VOC Emissions and Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

(a) In order to demonstrate compliance with the VOC limit in Condition G.2.1(a), the VOC emissions for each day shall be determined by the equation below and daily emissions summed for the rolling 365-day period.

$$\text{VOC Emissions} \equiv \left[\frac{1\text{ ton}}{2000\text{ lbs}}\right] \times \left[\left(X_R \times (EF_{V723})\right) + \left(Y_R \times (EF_{V519})\right)\right]$$

Where:

X_R = Amount of Resin produced, in Pounds per day, in operations associated with the V-723 gas absorber operation; and

Y_R = Amount of Resin produced, in Pounds per day, in operations associated with the V-519 gas absorber operation; and

EF_{V723} = Emission factor of 1.29E-05 lb VOC/lb Resin for V-723 or the emission factor determined in the most recent performance test; and

EF_{V519} = Emission factor of 2.84E-05 lb VOC/lb Resin for V-519 or the emission factor determined in the most recent performance test.

(b) Not later than December 11, 2007, and in order to demonstrate compliance with Condition G.2.1, the Permittee shall conduct a performance test to verify the VOC emission factors for emission units V-723 and V-519 using methods as approved by the Commissioner. These tests shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

G.2.6 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust for emission units F-705, F-706, F-741, V-334 BF, F-737, F-742, F-743, F-515R, V-598, V-508, F-546, F-7735, F-7733, V-7756A, V-7756B, F-7751A, F-7751B, F-7751C, F-5711, F-5705, V-7756C, F-5720 BF, F-5722 BF, F-5724 BF, F-5761A, F-5761B, F-5761C, F-5776, F-5778, F-506A, F-506, F7737, F-7736, V-506A, WPDR1, WPDR2, WPDR3, FDFS, F-5728, F-5723, CLN TRANS, and F-5786 shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from the filter associated with F-705, F-706, F-741, V-334 BF, F-737, F-742, F-743, F-515R, V-598, V-508, F-546, F-7735, F-7733, V-7756A, V-7756B, F-7751A, F-7751B, F-7751C, F-5711, F-5705, V-7756C, F-5720 BF, F-5722 BF, F-5724 BF, F-5761A, F-5761B, F-5761C, F-5776, F-5778, F-506A, F-506, F7737, F-7736, V-506A, WPDR1, WPDR2, WPDR3, FDFS, F-5728, F-5723, CLN TRANS, and F-5786, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

G.2.7 Record Keeping Requirements

(a) To document compliance with Condition G.2.1, the Permittee shall maintain records of the weight of VOCs emitted each day and the 365-day rolling total of the weight of VOCs emitted from the emission units V-723 and V-519, and the COS stream (involved in the 1995 or 1996 resin expansion project).

(b) Pursuant to 40 CFR 63.1104(l)(1) [DD.4(l)(1)], the Permittee shall maintain records of measurements, engineering assessments, and calculations used to determine the TRE index value of the process vents V-519 and V-723 according to the procedures in 40 CFR 63.1104(j), including those records associated with halogen vent stream determination. The documentation of engineering assessments shall include all data, assumptions, and procedures used for the engineering assessments, as specified in 40 CFR 63.1104(k).

(c) In order to document compliance with the alternative operating scenario in Condition G.2.2, and pursuant to 40 CFR 63, Subpart SS, the Permittee shall keep records as specified in the following applicable requirements in 40 CFR 63, Subpart SS which are described in Section EE.

Section EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS Requirement	Regulatory Citation Description	V-723	V-519
EE.12(a)	63.998(a)	Recordkeeping Requirements	X	X
EE.12(b)	63.998(b)	Recordkeeping Requirements	X	X
EE.12(c)	63.998(c)	Recordkeeping Requirements	X	X
EE.12(d)	63.998(d)	Recordkeeping Requirements	X	X

(d) To document compliance with Condition G.2.6, the Permittee shall maintain the weekly record of the visible emission notations required by Condition G.2.6(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(e) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if the Permittee operates under the alternative operating scenario as detailed in Condition G.2.2, the Permittee shall keep a record stating this. A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(f) All records required to be maintained by Condition G.2.7 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

G.2.8 Reporting Requirements

(a) A quarterly summary of the information to document compliance with Condition G.2.1(a) shall be submitted to the address listed in Section C- General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or the equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does not require the certification by the “authorized individual” as defined by 326 IAC 2-1.1-1(1). [The reporting form for this requirement is located at the end of Section K of this permit]

(b) In order to document compliance with the alternative operating scenario in Condition G.2.2, and pursuant to 40 CFR 63, Subpart SS, the Permittee shall submit reports as specified in 40 CFR 63.999(c) [described in EE.13(c)].

(c) The Permittee shall submit the reports and records required to be submitted by Condition G.2.8 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION G.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: LEXAN# Resin, Buildings 14 and 16

LEXAN# Resin Area Tanks

(d) Tanks located in the LEXAN # Resin Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum tank volume capacity, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-005	V-706	V-706 STORAGE TANK WITH SCRUBBER*	None	None	22.7 m^3	1970
N/A	V-5502	SOLUTION BLENDING TANK	None	None	75.7 m^3	N/A
N/A	V-5503	FRESH METHYLENE CHLORIDE STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-5504	RECYCLE METHYLENE CHLORIDE STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-5510	SOLUTION BLENDING STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-711A	RECYCLE SOLVENT STORAGE TANK	None	None	75.7 m^3	N/A
N/A	V-711B	RECYCLE SOLVENT STORAGE TANK	None	None	75.7 m^3	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
05-040	V-5509	TEA STORAGE TANK WITH VENT SCRUBBER*	None	None	22.9 m^3	N/A
05-049	V-5780	PTC TANK	None	None	34.1 m^3	N/A
05-071	V-5506	PCP STORAGE TANK WITH VENT SCRUBBER*	None	None	69.7 m^3	N/A
05-072	V5508	DAC TANK WITH VENT SCRUBBER*	None	None	69.8 m^3	N/A
05-155	V-5784	RESORCINOL TANK V-5784 WITH VENT SCRUBBER*	None	None	88.9 m^3	N/A
05-160	F-5787	HIGH HEAT MIXING TANK	None	None	22.3 m^3	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* Scrubber not required by any air regulation requirements.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

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Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.3.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit, any change or modification which increases the total VOC emissions from emission unit V-706, and from the emission units included in Conditions G.2.1(b), H.2.1, I.1.1, I.3.1 and J.1.1 of this Part 70 permit, to 25.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this and Conditions G.2.1, H.2.1, I.1.1, I.2.1, I.3.1, J.1.1, and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

G.3.2 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subpart SS] [40 CFR 63, Subpart YY]

The table that follows provides the specific applicable control and monitoring requirements of the GMACT that apply to V-5502, V-5503, V-5504, V-5510, V-711A, and V-711B. The table also provides the specific condition number where descriptions of these provisions can be found in Sections DD and EE.

(a) Pursuant to 40 CFR 63.1100(g)(1), the Permittee shall comply with the National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards (GMACT) [40 CFR 63, Subpart YY] by meeting the applicable emission standards and monitoring provisions of 40 CFR 63.1103(d) for the LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) storage vessels, V-5502, V-5503, V-5504, V-5510, V-711A, and V-711B.

(b) Pursuant to 40 CFR 63.1103(d) Table 5, the Permittee shall reduce emissions of total organic HAP by 95 weight-percent for the storage vessels, V-5502, V-5503, V-5504, V-5510, V-711A, and V-711B by venting emissions through a closed vent system to any combination of control devices meeting the requirements of the National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process [40 CFR 63, Subpart SS].

(c) Pursuant to 40 CFR 63.982(a), the Permittee has elected to route these storage vessels, V-5502, V-5503, V-5504, V-5510, V-711A, and V-711B to a process, therefore, the Permittee shall comply with 40 CFR 63.982(d).

Section DD or EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS or Subpart YY Requirement	Regulatory Citation Description	V-5502	V-5503	V-5504	V-5510	V-711A	V-711B
DD.2(d)	63.1103(d)	Source Category-Specific Applicability, Definitions, and Requirements	X	X	X	X	X	X
EE.1(a)	63.982(a)	Requirements	X	X	X	X	X	X
EE.1(d)	63.982(d)	Requirements	X	X	X	X	X	X
EE.3(a)	63.984(a)	Fuel Gas Systems And Processes To Which Storage Vessel, Transfer Rack, Or Equipment Leak Regulated Material Emissions Are Routed	X	X	X	X	X	X
EE.3(b)	63.984(b)	Fuel Gas Systems And Processes To Which Storage Vessel, Transfer Rack, Or Equipment Leak Regulated Material Emissions Are Routed	X	X	X	X	X	X

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Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

G.3.3 Record Keeping Requirements

(a) Pursuant to 40 CFR 63, Subpart SS and to document compliance with Condition G.3.2, the Permittee shall maintain records as specified in 40 CFR 63.998(d) [described in EE.12(d)] for the closed vent system used in routing the storage vessels identified as V-5502, V-5503, V-5504, V-5510, V-711A, and V-711B to a process.

(b) All records required to be maintained by Condition G.3.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

SECTION G.4 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: LEXAN# Resin, Buildings 14 and 16

LEXAN # Resin Waste

(e) The LEXAN # Resin area waste is identified below as:

(1) The process wastewater streams discarded from the LxrPPPU:

(A) Contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 10,000 parts per million by weight at any flow rate; or

(B) Contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G less than 1,000 parts per million by weight at an annual average flow rate greater than or equal to 10 liters per minute; and

(2) GMACT Maintenance Wastewater discarded from the LxrPPPU and contains organic HAP's listed in table 9 of 40 CFR 63, Subpart G. Some of the GMACT Maintenance Wastewater is associated with the Phosgene production unit located in Building 6 which is considered part of the polycarbonate production process unit identified as LxrPPPU.

P&ID No.	Wastewater Stream ID[(a)]	Wastewater Stream Unit Description
5-F-12G	2"-DR-A-512E-007	TEA Storage Tank Vent Scrubber F-5509 Drain
5-F-28A	4"-WNB-Yd-528A-63	Resin I Non-Brine Discharge to WWTP
5-F-28A	4"-P	Analyzer Sample Point for Resin I Non-Brine Discharge to WWTP
5-F-28A	½"-WNB-P-528A-68	Sample Point for Resin I Non-Brine Discharge to WWTP (Hot Sample)
5-F-28A	½"-WNB-Qt-528A-69	Sample Point for Resin I Non-Brine Discharge to WWTP (Cooled Sample)
5-F-28C	½"-BRP-Qt-528C-69	Brine Sample Point
5-F-28C	½"-BRP-Qt-528C-70	Brine Sample Point
5-F-28D	6"-BRP-D-528D-04	Brine to Brine Recovery Plant
5-F-50B	1"-DR-P-550B-70	S.D. Powder Scrubber F-5776 Vent Humidifier
5-F-50B	1 ½"-PV-P-550B-77	S.D. Powder Scrubber F-5776 Water Seal Drain
5-F-50B	3"-MWR-P-550B-19	S.D Powder Scrubber F-5776 Level Control Drain
5-F-101A	½"-NAOH-Qt-5101A-024	Caustic Sample Loop Off of RI Primary Caustic Scrubber V-5532 and V-5533
7-F-26	1"-WDI-P-726-43	Post Dryer Powder Scrubber F-733 Level Control Drain
7-F-101A	½"-NAOH-P-7101A-027	Caustic Sample Loop Off of RII Primary Caustic Scrubber V-7721 and V-7722
7-F-116A	6"-WNB-P-7116A-34	RII Non Brine Discharge to WWTP
7-F-116A	½"-WNB-P-7116A-60	Conductivity Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-116A	4"-P	Analyzer Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-116A	½"-WNB-P-7116A-60	Sample Point for Resin II Non-Brine Discharge to WWTP
7-F-142	1 ½"-MWS-P-7142-58	Post Dryer Powder Scrubber F-7734 Level Control Drain
7-F-162	1 ½"-WNB-P-7162-16-HW	Flash Dryer Powder Scrubber F-7806B Level Control Drain
5-F-26	1"-WDI-P-526-65	Post Dryer Powder Scrubber F-590 Level Control Drain
900-F-73C	1"-MWS-A-73C-028	Neutralizer Tank V-951 (Aqueous Phase)
N/A	N/A	GMACT MAINTENANCE WASTEWATER

[(a)] Each wastewater stream is identified with an affiliated P&ID number and wastewater stream unit description.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

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Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.4.1 Hazardous Air Pollutants (HAPs) - Maintenance Wastewater [326 IAC 20] [40 CFR 63, Subpart G] [40 CFR 63, Subpart YY]

Pursuant to 63.1106(b) [described in DD.3(b)], the Permittee shall comply with the GMACT maintenance wastewater requirements in 40 CFR 63.105. Pursuant to 40 CFR 63.105(d) [described in Condition AA.21(d)], the Permittee shall implement the maintenance wastewater procedures described in 40 CFR 63.105(b) and (c) for all maintenance wastewater that contains those organic HAP's listed in table 9 of 40 CFR 63, Subpart G as part of the start-up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3).

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

G.4.2 Record Keeping and Reporting Requirements [326 IAC 20] [40 CFR 63, Subpart G] [40 CFR 63, Subpart YY]

(a) Pursuant to 40 CFR 63, Subpart YY, the Permittee shall comply with the HON process wastewater requirements in 40 CFR 63.132 through 63.148, Subpart G except as otherwise specified in 40 CFR 63.1106. Accordingly, pursuant to 40 CFR 63.132(c), the following LxrPPPU process wastewater streams are Group 2; therefore, pursuant to 40 CFR 63.132(a)(3), the Permittee shall only comply with the applicable recordkeeping requirements specified in 63.146(b)(1) and 63.147(b)(8) for these process wastewater streams. The Permittee shall also maintain documentation pursuant to 63.147(f).

P&ID No.	Wastewater Stream ID
5-F-12G	2"-DR-A-512E-007
5-F-28A	4"-WNB-Yd-528A-63
5-F-28A	4"-P
5-F-28A	½"-WNB-P-528A-68
5-F-28A	½"-WNB-Qt-528A-69
5-F-28C	½"-BRP-Qt-528C-69
5-F-28C	½"-BRP-Qt-528C-70
5-F-28D	6"-BRP-D-528D-04
5-F-50B	1"-DR-P-550B-70
5-F-50B	1 ½"-PV-P-550B-77
5-F-50B	3"-MWR-P-550B-19
5-F-101A	½"-NAOH-Qt-5101A-024
7-F-26	1"-WDI-P-726-43
7-F-101A	½"-NAOH-P-7101A-027
7-F-116A	6"-WNB-P-7116A-34
7-F-116A	½"-WNB-P-7116A-60
7-F-116A	4"-P
7-F-116A	½"-WNB-P-7116A-60
7-F-142	1 ½"-MWS-P-7142-58
7-F-162	1 ½"-WNB-P-7162-16-HW
5-F-26	1"-WDI-P-526-65
900-F-73C	1"-MWS-A-73C-028

(b) Pursuant to 40 CFR 64.105(a) and to document compliance with Condition G.4.1, the Permittee shall keep records for the maintenance wastewater as specified in the following federal citations as described in Section AA.

Section AA Permit Condition	Applicable 40 CFR Part 63, Subpart F Requirement	Regulatory Citation Title
AA.8(b)	63.105(b)	Maintenance Wastewater Requirements
AA.8(c)	63.105(c)	Maintenance Wastewater Requirements
AA.8(e)	63.105(e)	Maintenance Wastewater Requirement

(c) All records required to be maintained by Condition G.4.2 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(d) The Permittee shall submit the reports and records required to be submitted by Condition G.4.2 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION G.5 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: LEXAN# Resin, Buildings 14 and 16

LEXAN # Resin Leak Detection and Repair (LDAR) Components

(f) The LEXAN # Resin Polycarbonate Production Process Unit (LxrPPPU) consists of equipment subject to LDAR. LDAR applies to:

(1) The collection of all LxrPPPU components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open ended valves or lines, valves, connectors, and instrumentation systems intended to operate in organic hazardous air pollutant service for 300 hours or more during the calendar year. In organic HAP service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight HAP. Some of this equipment is routed through a closed vent system, identified as LxrCVS1 and into an emergency vent scrubber, identified as LxrEVS or through a closed vent system, identified as PhosCVS1 and into an emergency vent scrubber, identified as PhosC-964.

(2) The collection of all MeCL_Eq components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, surge control vessels, bottoms receivers, and instrumentation systems that are in methylene chloride service. In methylene chloride service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 5 percent by weight of methylene chloride. For clarification purposes, MeCL_Eq components are part of the LxrPPPU, but are regulated under 40 CFR 63, Subpart H and I instead of 40 CFR 63, Subpart YY.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.5.1 Equipment Leaks [326 IAC 20] [40 CFR 63, Subpart H and I] [40 CFR 63, Subpart SS] [40 CFR 63, Subpart TT] [40 CFR 63, Subpart YY]

(a) Pursuant to 40 CFR 63.190(b) and 63.190(e), the provisions of 40 CFR 63, Subparts H and I apply to the MeCL_Eq. The Permittee shall control leaks of methylene chloride from each pump, compressor, agitator, pressure relief device, sampling connection system, open-ended valve or line, valve, connector, surge control vessel, bottoms receiver, and instrumentation system that is associated with the MeCL_Eq according to the following 40 CFR 63, Subpart H applicable requirements as described in Section CC. Pursuant to 63.190(d), any components located in the MeCL_Eq, that are intended to operate in methylene chloride service for less than 300 hours during the calendar year are exempt from the provisions of 40 CFR 63 Subpart H and I. The MeCL_Eq is also subject to 40 CFR 63, Subpart YY, however, pursuant to 40 CFR 63.1100(g)(4)(ii), the Permittee has elected to comply with 40 CFR 63, Subparts H and I for all equipment located within in the MeCL_Eq.

Section CC Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.1	63.162	Standards: General
CC.2	63.163	Standards: Pumps In Light Liquid Service

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Section CC Permit Condition	Applicable 40 CFR Part 63, Subpart H Requirement	Regulatory Citation Title
CC.3	63.164	Standards: Compressors
CC.4	63.165	Standards: Pressure Relief Devices In Gas/Vapor Service
CC.5	63.166	Standards: Sampling Connection Systems
CC.6	63.167	Standards: Open-Ended Valves or Lines
CC.7	63.168	Standards: Valves In Gas/Vapor Service and In Light Liquid Service
CC.8	63.169	Standards: Pumps, Valves, Connectors, and Agitators In Heavy Liquid Service; Instrumentation Systems,; and Pressure Relief Devices In Liquid Service
CC.9	63.170	Standards: Surge Control Vessels and Bottoms Receivers
CC.10	63.171	Standards: Delay of Repair
CC.11	63.172	Standards: Closed-Vent Systems and Control Devices
CC.12	63.173	Standards: Agitators In Gas/Vapor Service and In Light Liquid Service
CC.13	63.174	Standards: Connectors In Gas/Vapor Service and In Light Liquid Service
CC.14	63.176	Quality Improvement Program For Pumps
CC.15	63.179	Alternative Means of Emission Limitation: Enclosed-Vented Process Units
CC.16	63.180	Test Methods and Procedures

(b) Pursuant to 40 CFR 63.1103(d), the Permittee has elected to comply with 40 CFR 63, Subpart TT for all LxrPPPU equipment that is subject to 40 CFR 63, Subpart YY but not subject to 40 CFR 63, Subpart H and I.

(1) The Permittee shall control leaks of HAPs from each pump, compressor, agitator, pressure relief device, sampling connection system, open ended valve or line, valve, and connector in organic hazardous air pollutant service according to the following listed provisions of 40 CFR 63, Subpart TT as described in Section JJ. Any equipment, as defined in Subpart YY, that operates in organic hazardous air pollutant service for 300 hours or less during the calendar year is exempt from the provisions of 40 CFR 63 Subpart YY.

Section JJ Permit Condition	Applicable 40 CFR Part 63, Subpart TT Requirement	Regulatory Citation Title
JJ.1	63.1002	Compliance Assessment
JJ.2	63.1003	Equipment Identification
JJ.3	63.1004	Instrument And Sensory Monitoring For Leaks
JJ.4	63.1005	Leak Repair
JJ.5	63.1006	Valves In Gas And Vapor Service And In Light Liquid Service Standards
JJ.6	63.1007	Pumps In Light Liquid Service Standards
JJ.7	63.1008	Connectors In Gas And Vapor Service And In Light Liquid Service Standards

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Section JJ Permit Condition	Applicable 40 CFR Part 63, Subpart TT Requirement	Regulatory Citation Title
JJ.8	63.1009	Agitators In Gas And Vapor Service And In Light Liquid Service Standards
JJ.9	63.1010	Pumps, Valves, Connectors, And Agitators In Heavy Liquid Service; Pressure Relief Devices In Liquid Service; And Instrumentation Systems Standards
JJ.10	63.1011	Pressure Relief Devices In Gas And Vapor Service Standards
JJ.11	63.1012	Compressor Standards
JJ.12	63.1013	Sampling Connection Systems Standards
JJ.13	63.1014	Open-Ended Valves Or Lines Standards

(2) Pursuant to 40 CFR 63.1016, the Permittee has elected to enclose some of the equipment within the LxrPPPU in such a manner that all emissions from these particular equipment leaks are vented through one of two closed vent systems, identified as LxrCVS1 and PhosCVS1, and into one of two emergency vent scrubbers, identified as LxrEVS and PhosC-964. The Permittee shall comply with the following provisions of 40 CFR 63, Subpart SS and Subpart TT as described in Sections EE and JJ.

Section EE and JJ Permit Condition	Applicable 40 CFR Part 63, Subpart SS or Subpart TT Requirement	Regulatory Citation Title
JJ.1	63.1002	Compliance Assessment
JJ.2	63.1003	Equipment Identification
JJ.14	63.1015	Closed Vent Systems And Control Devices; Or Emissions Routed To A Fuel Gas System Or Process
JJ.15	63.1016	Alternative Means Of Emission Limitation: Enclosed-Vented Process Units
EE.1(a)	63.982(a)	Requirements
EE.1(c)	63.982(c)	Requirements
EE.2	63.983	Closed Vent Systems
EE.4	63.986	Nonflare Control Devices Used For Equipment Leaks Only

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

G.5.2 Record Keeping and Reporting Requirements

(a) To document compliance with Condition G.5.1(a), the Permittee shall keep records and submit reports for the MeCL_Eq as specified in the following provisions of 40 CFR 63, Subpart H and Subpart I which are described in Section CC and MM.

Section CC Permit Condition	Applicable 40 CFR Part 63, Subparts H or I Requirement	Regulatory Citation Title
CC.15	63.181	Recordkeeping Requirements

CC.16	63.182	Reporting Requirements
MM.1(f)	63.192(f)	Standard
MM.1(g)	63.192(g)	Standard

(b) To document compliance with Condition G.5.1(b)(1), the Permittee shall keep records and submit reports for the applicable equipment in the LxrPPPU as specified in the following provisions of 40 CFR 63, Subpart TT which are described in Section JJ.

Section JJ Permit Condition	Applicable 40 CFR Part 63, Subpart TT Requirement	Regulatory Citation Title
JJ.16	63.1017	Recordkeeping Requirements
JJ.17	63.1018	Reporting Requirements

(c) To document compliance with Condition G.5.1(b)(2), the Permittee shall keep records and submit reports for the applicable equipment in the LxrPPPU as specified in the following provisions of 40 CFR 63, Subpart TT which are described in Section EE and JJ.

Section EE and JJ Permit Condition	Applicable 40 CFR Part 63, Subpart TT Requirement	Regulatory Citation Title
JJ.15	63.1016	Alternative Means Of Emission Limitation: Enclosed-Vented Process Units
JJ.16	63.1017	Recordkeeping Requirements
JJ.17	63.1018	Reporting Requirements
EE.12(d)(4)	63.998(d)(4)	Recordkeeping Requirements
EE.13(c)	63.999(c)	Notifications And Other Reports

(d) All records required to be maintained by Condition G.5.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition G.5.3 to the address listed in Section C - General Reporting Requirements, of this permit.

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SECTION G.6 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: LEXAN# Resin Area; Buildings 14 and 16

Certain liquid streams in open systems

(g) The LEXAN # Resin Polycarbonate Production Process Unit (LxrPPPU) includes certain liquid streams subject to open system control requirements. These control requirements apply to the LEXAN # Resin PPPU components described as:

(1) A drain, drain hub, manhole (including sumps and other points of access to a conveyance system), lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flow rate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute; and/or

(2) A tank with capacity equal to or greater than 38 cubic meters that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flowrate greater than or equal to 10 liters per minute.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

G.6.1 Hazardous Air Pollutants (HAPs)[326 IAC 20] [40 CFR 63, Subpart F] [40 CFR 63, Subpart G] [40 CFR 63, Subpart YY]

(a) Pursuant to 63.1106(c) [described in DD.3(c)], the Permittee shall comply with the provisions of Table 35 of 40 CFR 63, Subpart G for any drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at any flow rate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute and the drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the item of equipment is not otherwise exempt from controls by the provisions of 40 CFR 63, Subparts A, F, G, H, or YY.

(b) Pursuant to 40 CFR 63.1106(c), the Permittee shall comply with the control requirements according to Table 35 of 40 CFR 63, Subpart G for any tank with capacity equal to or greater than 38 cubic meters that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 ppm (by weight) of 40 CFR 63, Subpart G, Table 9 compounds at an annual average flow rate greater than or equal to 10 liters per minute and the tank is controlled less stringently than in table 35 and is not listed in 40 CFR 63.100(f), and the tank is not otherwise exempt from controls by the provisions of 40 CFR 63, Subparts A, F, G, H, or YY.

(c) Pursuant to 40 CFR 63.1106(c)(5), when terms used in Table 35 of 40 CFR 63, Subpart G are defined in 40 CFR 63.1101, the definition in 63.1101 shall apply. For terms used in Table 35 of 40 CFR 63, Subpart G that are not defined in 40 CFR 63.1101, the definitions of 40 CFR 63.101 and 63.111 shall apply.

(d) Pursuant to 40 CFR 63.1106(c)(6), when Table 35 of 40 CFR 63, Subpart G refers to 40 CFR 63.119(e)(1) or (e)(2) in the requirements for tanks, the requirements in 40 CFR 63.982(a)(1) shall apply.

Compliance Determination Requirements

G.6.2 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart G]

Pursuant to 40 CFR 63.149(e)(2), the total annual average concentration and annual average flow rate for liquid streams associated with a tank shall be determined at the inlet to the tank and according to the procedures in 40 CFR 63.144(b) and (c).

Section G consists of the following Sections: G.1, G.2, G.3, G.4, G.5, and G.6.

Condition G.6.2 concludes the Section G requirements of this permit

SECTION H.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Brine Recovery, Building 32

Brine Recovery Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the entire affected source subject to the applicable regulation.

(a) BR-ASBSTOS is the operation for manufacture of chlorine using asbestos diaphragm technology, which is subject to 40 CFR 61, Subpart M. This operation includes an enclosed work area controlled by a vent scrubber, identified as V-40-1, which exhausts to one (1) stack, identified as 06-034.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

H.1.1 General Provisions Relating to HAPs [326 IAC 14] [40 CFR 61, Subpart A]

The provisions of 40 CFR Part 61, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, apply to BR-ASBSTOS except when otherwise specified in 40 CFR 61, Subpart M.

H.1.2 Hazardous Air Pollutants [326 IAC 14] [40 CFR 61, Subpart M]

(a) Pursuant to 40 CFR 61.144(b)(1), the Permittee shall discharge no visible emissions to the outside air from BR-ASBSTOS operations or from any building or structure in which these operations are conducted or from any other fugitive sources.

(b) Pursuant to 40 CFR 61.144(b)(3), the Permittee shall monitor the scrubber exhaust of vent scrubber, 06-034 (V-40-1), located within BR-ASBSTOS, at least once each day during daylight hours for visible emissions to the outside air during periods of operation. The monitoring shall be by visual observation of at least 15 seconds duration per source of emissions.

Compliance Determination Requirements

H.1.3 Air Cleaning Device Inspections

Pursuant to 40 CFR 61.144(b)(4), the Permittee shall inspect the vent scrubber, V-40-1, controlling BR-ASBSTOS at least once each week for proper operation and for changes that signal the potential for malfunctions.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

H.1.4 Record Keeping Requirements

(a) For air cleaning devices that cannot be inspected on a weekly basis according to Condition H.1.3, the Permittee shall revise as necessary and submit to IDEM, OAQ, a written maintenance plan to include, at a minimum, the following:

(1) Maintenance schedule; and

(2) Recordkeeping plan.

(b) Pursuant to 40 CFR 61.144(b)(5) and to document compliance with Condition H.1.2 and H.1.3, the Permittee shall maintain records of the results of visible emission monitoring and scrubber inspections using a format similar to that shown in 40 CFR 61.142 Figures 1 and 2 and include the following:

(1) Date and time of each inspection; and

(2) Presence or absence of visible emissions; and

(3) Brief description of any corrective actions taken, including date and time; and

(4) Daily hours of operation for the scrubber.

(c) Pursuant to 40 CFR 61.144(b)(6), the Permittee shall furnish upon request, and make available at the BR-ASBSTOS operation during normal business hours for inspection by IDEM, OAQ, all records required in Condition H.1.4.

(d) All records required to be maintained by Condition H.1.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

H.1.5 Reporting Requirements

(a) Pursuant to 40 CFR 61.144(b)(8) and in order to comply with H.1.2, the Permittee shall submit semiannually a copy of the visible emission monitoring records to IDEM, OAQ if visible emission occurred during the report period. Semiannual reports shall be postmarked by the 30th day following the end of the six-month period.

(b) The Permittee shall submit the reports and records required to be submitted by Condition H.1.5 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION H.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Brine Recovery, Building 32

Brine Recovery Operations

(b) The Brine Recovery operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
06-008	V-70-4C	HCL SYNTHESIS SCRUBBER TOWER VENT (V70-10)*	None	None	N/A	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
06-006	V70-2	HCL TANK TRUCK TRANSFER AND STORAGE VENT SCRUBBER (V70-2)*	None	None	N/A	N/A
06-010	V20-5	BRINE SURGE TANK (V20-5)	None	None	N/A	N/A
06-011	ACID SUMP	ACID SUMP	None	None	N/A	N/A
06-012	V20-7	ACID BRINE STRIPPER (V20-7)	None	None	N/A	N/A
06-035	V-53-1	ENCLOSURE VENTILATION SCRUBBER (EVS) (V53-1)**	None	None	N/A	N/A
06-055	V20-21	RAW BRINE STORAGE TANK (V20-21)	None	None	N/A	N/A
06-058	V70-3	HCL RAILCAR LOADING STATION WITH SCRUBBER (V70-3)*	None	None	N/A	N/A
06-061	V20-17A	NORTH COOLING POND (V20-17A)	None	None	N/A	N/A
06-062	V20-17B	SOUTH COOLING POND (V20-17B)	None	None	N/A	N/A
06-064	V20-15B	ACIDIFICATION/DEGASSING TANK (V20-15B)	None	None	N/A	N/A
06-067	V53-2A	ENCLOSURE VENTILATION SCRUBBER (EVS) CIRCULATION TANK (V53-2A)	None	None	N/A	N/A
06-068	V53-2B	ENCLOSURE VENTILATION SCRUBBER (EVS) CIRCULATION TANK (V53-2B)	None	None	N/A	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[d] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* Scrubber controls hydrogen chloride fumes and is not required by any air regulation requirements.

** V-53-1 is a scrubber used to contain and destroy fugitive or accidental releases of chlorine gas that may occur inside the chlorine enclosure area of the brine recovery operations. This scrubber is a safety system integral to process operations and is not considered a control or recovery device.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

H.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit, any change or modification which increases the total VOC emissions from emission unit V20-7, and from the emission units included in Conditions G.2.1(b), G.3.1, I.1.1,

I.3.1, and J.1.1 of this Part 70 permit, to 25.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions G.2.1, G.3.1, I.1.1, I.2.1, I.3.1, J.1.1, and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

Section H consists of the following Sections: H.1, and H.2.

Condition H.2.1 concludes the Section H requirements of this permit

SECTION I.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Phosgene, Building 6

Phosgene Affected Facilities/Sources

(a) The Phosgene Reaction, Purification, and Transfer Operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
08-001	F-972	TAIL GAS SEPARATOR (WITH FLARE H-961)*	One of two scrubber systems: (C-962 and C-963) OR (C-966 and C-967)	None	N/A	1979
08-004	F-902	CARBON SYSTEM BLOWER TRANSFER CYCLONE (K-909)	None	Bagfilter	2.0 tons/hr	N/A
08-007	V-967	EVS CAUSTIC SCRUBBER VENT C964	Scrubber C964	None	N/A	N/A

Insignificant Activities[(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
08-003	F-901	CARBON SYSTEM BLOWER RAILCAR UNLOADING (K-901)	None	Bagfilter	2.0 tons/hr	N/A
08-005	V-969	VENT SCRUBBER RECIRCULATION TANK (V-969)	None	None	N/A	N/A
08-006	V-971A	CAUSTIC MAKE-UP TANK (V-971A)	None	None	N/A	N/A
08-008	V-951	CARBON TET. NEUTRALIZATION AND DRUM-OFF STATION (V-951)	None	None	N/A	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* H-961 is used to control CO emissions in the gas stream exiting the tail gas scrubber system. There are no regulatory requirements for this flare.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

I.1.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit, any change or modification which increases the total VOC emissions from emission units F-972, F-901, F-902, and from the emission units included in Conditions G.2.1(b), G.3.1, H.2.1, I.3.1, and J.1.1 of this Part 70 permit, to 25.0 tons per year or greater must receive

prior approval from IDEM, OAQ. Compliance with this Condition and Conditions G.2.1, G.3.1, H.2.1, I.2.1, I.3.1, J.1.1, and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

I.1.2 Hazardous Air Pollutants (HAPs) [326 IAC 20] [40 CFR 63, Subpart SS] [40 CFR 63, Subpart YY]

(a) Pursuant to 40 CFR 63.1100, the Permittee shall comply with the National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards (GMACT) [40 CFR 63, Subpart YY] by meeting the applicable emission standards and monitoring provisions of 40 CFR 63.1103 (d), Table 5 for the LEXAN# Resin Polycarbonate Production Process Unit (LxrPPPU) process vent, F-972. The process vent F-972 is associated with the Phosgene production unit that is part of the polycarbonate production process unit identified as LxrPPPU; general requirements for the LxrPPPU can be found in Section G.1 of this permit.

(b) Pursuant to 40 CFR 63.1103(d), Table 5, the Permittee shall reduce total organic HAP to a concentration of 20 parts per million by volume and reduce hydrogen halides and halogens to less than 0.45 kg/hr by venting emissions from the process vent, F-972 into a tail gas scrubber system, identified as scrubbers, C-966 and C-967, meeting the requirements of Subpart SS, as specified in 40 CFR 63.982(a)(2). The specific applicable control and monitoring requirements of 40 CFR 63, Subparts YY and SS are listed in the table below. This table also provides the specific condition number where descriptions of these provisions can be found in Sections DD and EE. Instead of using the tail gas scrubber system, identified as scrubbers C-966 and C-967 to comply with the provisions listed below, the Permittee may elect one of the alternative operating scenarios for process vent F-972 as described in Condition I.1.3.

Section DD and EE Permit Condition	Applicable 40 CFR Part 63, Subpart YY or Subpart SS Requirement	Regulatory Citation Description	F-972
DD.2(d)	63.1103(d)	Source Category-Specific Applicability, Definitions, and Requirements	X
EE.1(a)	63.982(a)(2)	Requirements	X
EE.1(c)	63.982(c)	Requirements	X
EE.5(a)	63.990(a)	Absorbers, Condensers, and Carbon Adsorbers used as Control Devices	X
EE.7(a)	63.994(a)	Halogen Scrubbers and other Halogen Reduction Devices	X
EE.8(b)	63.996(b)	General Monitoring Requirements For Control And Recovery Devices	X
EE.8(c)	63.996(c)	General Monitoring Requirements For Control And Recovery Devices	X
EE.8(d)	63.996(d)	General Monitoring Requirements For Control And Recovery Devices	X

(c) Pursuant to 40 CFR 63.996(d), USEPA has approved an alternative monitoring request in a letter dated April 5, 2002 so that the Permittee shall monitor Phosgene concentration in the gas stream exiting the tail gas scrubber system (C-966/C-967) in lieu of (1) monitoring total organic hazardous air pollutants at the outlet of the caustic scrubber (C-967) as

required by 40 CFR 63.990(c), and (2) monitoring the pH and scrubber liquid flow and determining the gas stream flow as required under 40 CFR 63.994(c) for the caustic scrubber (C-967) that also operates as a halogen reduction device. The Phosgene monitored parameter range representing proper operation of the tail gas scrubber system (C-966/C-967) that is used to control emissions from the process vent F-972, shall be Phosgene concentrations that are less than or equal to 1.0 ppm.

I.1.3 Alternative Operating Scenario for F-972 to comply with GMACT [326 IAC 20] [40 CFR 63, Subpart YY]

Instead of using the tail gas scrubber system, identified as scrubbers C-966 and C-967 to comply with the provisions in Condition I.1.2(b), the Permittee may elect one of the following other tail gas scrubber system options to reduce total organic HAP to a concentration of 20 parts per million by volume and reduce halogen halides and halogens to less than 0.45 kg/hr by venting emissions from the process vent, F-972 through a closed vent system:

(a) If this alternative is chosen, then the Permittee shall use the tail gas scrubber system, identified as scrubbers, C-962 and C-963, meeting the requirements of Subpart SS, as specified in 40 CFR 63.982(a)(2) to comply with the alternative operating scenario of this condition. The specific applicable control and monitoring provisions are listed in the table of Condition I.1.2(b); or

(b) If this alternative is chosen, then the Permittee shall use both tail gas scrubber systems, identified as scrubbers, C-962 and C-963, and C-966 and C-967, meeting the requirements of Subpart SS, as specified in 40 CFR 63.982(a)(2) to comply with the alternative operating scenario of this condition. The specific applicable control and monitoring provisions are listed in the table of Condition I.1.2(b).

I.1.4 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the following emission units shall not exceed the calculated rates given in pounds per hour when operating at the maximum process weight rate shown in the table below. The current maximum process weight rate shown is not a limitation. The pounds per hour limitations were calculated using the following equations:

Interpolation of the data for the process weight rate up to 60,000 pounds per hour shall be accomplished by use of the equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

Interpolation and extrapolation of the data for the process weight rate in excess of sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$E = 55.0\ P^{0.11} - 40$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

Stack/Vent ID	Emission Unit ID	Max Process Weight Rate (tons/hr)	Rate of Emission (lb/hr)
08-003	F-901	2.0	6.52
08-004	F-902	2.0	6.52

Compliance Determination Requirements

I.1.5 Organic HAP Control [326 IAC 2-7-6(6)]

In order to comply with Condition I.1.2, at least one of the scrubber systems identified as C-962 and C-963, or C-966 and C-967, shall be in operation at all times F-972 is in operation, except as otherwise provided in 40 CFR 63.1108.

I.1.6 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with Condition I.1.4, the bagfilters on emission units F-901 and F-902 shall be in operation at all times that these facilities are in operation and the filter is necessary to maintain emissions at or below the allowable emission rate.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

I.1.7 Record Keeping Requirements

(a) Pursuant to 40 CFR 63, Subpart SS and to document compliance with Condition I.1.2 or the alternative operating scenarios given in Condition I.1.3, the Permittee shall keep records as specified in the following 40 CFR 63, Subpart SS applicable requirements which are described in Section EE.

Section EE Permit Condition	Applicable 40 CFR Part 63, Subpart SS Requirement	Regulatory Citation Description	F-972
EE.12(a)	63.998(a)	Recordkeeping Requirements	X
EE.12(b)	63.998(b)	Recordkeeping Requirements	X
EE.12(c)	63.998(c)	Recordkeeping Requirements	X
EE.12(d)	63.998(d)	Recordkeeping Requirements	X

(b) All records required to be maintained by Condition I.1.7 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

I.1.8 Reporting Requirements

(a) Pursuant to 40 CFR 63, Subpart SS and to document compliance with Condition I.1.2, the Permittee shall submit reports as specified in 40 CFR 63.999(c) [described in EE.13(c)] and 40 CFR 63.1110 [described in DD.9].

(b) The Permittee shall submit the reports and records required to be submitted by Condition I.1.8 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION I.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Phosgene, Building 6

Phosgene Carbon Monoxide Generators and COS (Carbonyl Sulfide) Stream

(b) The Phosgene Carbon Monoxide Generators consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[(a)]

Stack / Vent I.D	Emission Unit*	Emission Unit Description	Air Pollution Control Devices**	Integral Devices[(b)] ***	Maximum Capacity[(c)]	Date of Construct
08-010	COG1	CO GENERATOR NO. 1	COS Vent Oxidizer (08-706) OR COS Flare (08-707)	Carbon Adsorbers V-948, V-949, V-050A, V-951A, V-9020, V-9021	0.17 tons/hr	N/A
08-011	COG2	CO GENERATOR NO. 2			0.17 tons/hr	N/A
08-012	COG3	CO GENERATOR NO. 3			0.17 tons/hr	N/A
08-013	COG4	CO GENERATOR NO. 4			0.17 tons/hr	N/A
08-014	COG5	CO GENERATOR NO. 5			0.17 tons/hr	N/A
08-015	COG6	CO GENERATOR NO. 6			0.17 tons/hr	N/A
08-016	COG7	CO GENERATOR NO. 7			0.17 tons/hr	N/A
08-017	COG8	CO GENERATOR NO. 8			0.17 tons/hr	N/A
08-018	COG9	CO GENERATOR NO. 9			0.17 tons/hr	N/A
08-019	COG10	CO GENERATOR NO. 10			0.17 tons/hr	N/A
08-020	COG11	CO GENERATOR NO. 11			0.17 tons/hr	N/A
08-021	COG12	CO GENERATOR NO. 12			0.17 tons/hr	N/A
08-022	COG13	CO GENERATOR NO. 13			0.17 tons/hr	N/A
08-023	COG14	CO GENERATOR NO. 14			0.17 tons/hr	N/A
08-024	COG15	CO GENERATOR NO. 15			0.17 tons/hr	N/A
08-025	COG16	CO GENERATOR NO. 16			0.17 tons/hr	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

* The 16 CO generators operate in a continuous mode and the CO produced by the generators is normally routed through the purification system and into the phosgene reactor. Each of the 16 generators has a stack/vent that is only used during startup, shutdown, and malfunction events.

** In addition to having the option to use the Oxidizer (08-706) for controlling organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either the Erie Boiler, Lasker Boiler, B&W Boiler, and/or Riley Boiler. These boilers are described in Section K of this permit. The COS Flare (08-707) only serves as back-up to the COS Vent Oxidizer (08-706) and during safety interlock of the system.

*** These carbon adsorbers purify the carbon monoxide as it flows from the CO generators to the phosgene reactor. Without the purification, the carbon monoxide quality is not adequate to produce phosgene that is suitable for use in polycarbonate production. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

I.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to Condition D.1.1 of permit SSM 129-14373-00002, issued on May 9, 2002, and to render the requirements of 326 IAC 2-2 not applicable, the following conditions as revised through the Title V permit shall apply to the Carbon Monoxide Generators identified as COG1, COG2, COG3, COG4, COG5, COG6, COG7, COG8, COG9, COG10, COG11, COG12, COG13, COG14, COG15, and COG16; the oxidizer identified as COS Vent Oxidizer; the flare identified as COS Flare; and the boilers listed in Condition K.2.1 (E Boiler, L Boiler, BW-Boiler, V Boiler, and/or R Boiler).

(a) The total sulfur input to the carbon monoxide generators identified as COG1, COG2, COG3, COG4, COG5, COG6, COG7, COG8, COG9, COG10, COG11, COG12, COG13, COG14, COG15, and COG16 and the coal-fired boilers (E BOILER, L BOILER, and V BOILER) listed in Condition K.2.1(a)(1) shall not exceed 2,536.75 tons in any 365-day period, rolled on a daily basis.

The sulfur inputs shall be determined according to the following equation:

*Daily Sulfur Input = Daily Coke Usage * (wt% Sulfur of Coke) + Daily Coal Usage * (wt% Sulfur of Coal)*

(b) The total emissions of organic sulfides from any control device to which the COS stream is vented shall be limited to 10.7 pounds VOC per hour or the rate determined in the most recent stack test of the E BOILER, L BOILER, or V BOILER such that the total VOC emissions from the COS stream and the resin vent gas absorbers identified as V-723 and V-519 in Section G.2 of this permit shall not exceed 55.0 tons per year and the emission units from the 1995 and 1996 resin expansion projects (the COS stream, the resin vent absorbers identified as V-723 and V-519, and the emission units included in Conditions G.2, G.3, H.2, I.1, I.3, J.1, and K.2) shall have an emission increase of less than 40.0 tons VOC per year. This effectively limits the combination of emissions from the COS stream, the resin vent gas absorbers identified as V-723 and V-519, and the other emission units involved in the 1995 and 1996 resin expansion projects (the emission units included in Sections G.2, G.3, H.2, I.1, I.3, J.1, and K.2 of this Part 70 permit), to a total of 80.0 tons VOC per year (baseline emissions plus emission increase).

(c) Whenever the carbonyl sulfide stream, COS is being vented to the COS Vent Oxidizer for the destruction of organic sulfides, the total sulfur input to the carbon monoxide generators shall be limited to 928.65 tons per 365-day period, rolled on a daily basis.

The sulfur inputs shall be determined according to the following equation:

*Daily Coke Sulfur Input = Daily Coke Usage * (wt% Sulfur of Coke)*

Note: Sulfur input limit assumes 100% conversion of sulfur in coke to organic sulfides.

(d) Whenever the carbonyl sulfide stream, COS is being vented to the COS Flare for the destruction of organic sulfides (used only as a back-up to the COS Vent Oxidizer and during safety interlock of the system), the total sulfur input to the carbon monoxide generators shall be limited to 928.65 tons per 365-day period, rolled on a daily basis.

The sulfur inputs shall be determined according to the following equation:

*Daily Coke Sulfur Input = Daily Coke Usage * (wt% Sulfur of Coke)*

Note: Sulfur input limit assumes 100% conversion of sulfur in coke to organic sulfides.

Compliance with these conditions and Conditions G.2.1 and K.2.1(a) will limit the increase in sulfur dioxide emissions and the volatile organic compound emissions to below 40 tons per year each. Therefore, the Prevention of Significant Deterioration (PSD) rules, 326 IAC 2-2, will not apply.

I.2.2 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units COG1, COG2, COG3, COG4, COG5, COG6, COG7, COG8, COG9, COG10, COG11, COG12, COG13, COG14, COG15, and COG16 shall not exceed the rates calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for these emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
08-010	COG1	0.17	1.25
08-011	COG2	0.17	1.25
08-012	COG3	0.17	1.25
08-013	COG4	0.17	1.25
08-014	COG5	0.17	1.25
08-015	COG6	0.17	1.25
08-016	COG7	0.17	1.25
08-017	COG8	0.17	1.25
08-018	COG9	0.17	1.25
08-019	COG10	0.17	1.25
08-020	COG11	0.17	1.25
08-021	COG12	0.17	1.25
08-022	COG13	0.17	1.25
08-023	COG14	0.17	1.25
08-024	COG15	0.17	1.25
08-025	COG16	0.17	1.25

Compliance Determination Requirements

I.2.3 Volatile Organic Compounds (VOC) and Sulfur Dioxide (SO_2) from the COS stream

Pursuant to Condition D.1.1 of permit SSM 129-14373-00002, issued on May 9, 2002, and to render the requirements of 326 IAC 2-2 not applicable, the following conditions as revised through the Title V permit shall apply to the Carbon Monoxide Generators identified as COG1, COG2, COG3, COG4, COG5, COG6, COG7, COG8, COG9, COG10, COG11, COG12, COG13, COG14, COG15, and COG16; the oxidizer identified as COS Vent Oxidizer; the flare identified as COS Flare; and the boilers listed in Condition K.2.1 (E Boiler, L Boiler, BW Boiler, V Boiler, and/or R Boiler).

(a) In order to comply with Condition I.2.1, at least one of the control devices used for organic sulfide control (COS Vent Oxidizer, COS Flare or E BOILER, L BOILER, BW-BOILER, or R BOILER described in Section K) shall be in operation and control organic sulfide emissions from the COS stream at all times any of the carbon monoxide adsorbers are being regenerated.

(b) To determine compliance with Condition I.2.1(a):

(1) The sulfur content of the coke used in the carbon monoxide generators shall be analyzed daily as received (vendor delivery analysis may be used, approved by IDEM on 8/1/05) for each day the carbon monoxide generators operate; and

(2) The sulfur content of the coal used by L BOILER, E BOILER, and V BOILER described in Condition K.2.1(a)(1) shall be analyzed daily (the sulfur content determined pursuant to condition K.2.11(b) may be used).

(c) To determine compliance with Condition I.2.1(b) and whenever the COS stream is vented to two or more of the three types of control devices permitted for use (oxidizer and flare described in this section; or boilers as described in Section K) during a calendar day, VOC emissions shall be calculated as follows:

(1) When calculating daily VOC emissions from a specific control device, the Permittee shall use the following equations as appropriate:

(A) Daily VOC emissions from the E BOILER or L BOILER equals:

*(10.7 pounds organic sulfides per hour or the rate determined in the most recent stack test of the E BOILER or L BOILER) * (24 hours per day)*

(B) Daily VOC emissions from the COS Vent Oxidizer equals:

*Daily coke usage * (wt % sulfur of coke) * (60.075 lb-mol wt. of organic sulfides / 32.064 lb-mol wt. of sulfur) * (1 - destruction efficiency of oxidizer as determined in the most recent stack test)*

(C) Daily VOC emissions from the Flare equals:

*Daily coke usage * (wt % sulfur of coke) * (60.075 lb-mol wt. of organic sulfides / 32.064 lb-mol wt. of sulfur) * (1 - 0.99)*

(2) When calculating the total daily VOC emissions from more than one specific control device whenever the COS stream was vented to two or more of the three types of control devices permitted for use, the Permittee shall sum the organic sulfides emissions (VOC's) from each type of control device used during the day as follows:

(A) For organic sulfides (VOC's) controlled by E BOILER or L BOILER, the value for a day's VOC emissions shall be 10.7 pounds organic sulfides per hour, or the rate determined in the most recent stack test of the E BOILER, L BOILER, or V BOILER, multiplied by the number of hours the organic sulfides were vented to the E BOILER, L BOILER, or V BOILER; and

(B) For organic sulfides (VOC's) controlled by the COS Vent Oxidizer, the value for a day's VOC emissions calculated pursuant to Condition I.2.3(c)(1)(B) shall be multiplied by the ratio of the amount of time organic sulfides were vented to the COS Vent Oxidizer and divided by the amount of time in such a calendar day that any organic sulfides were generated; and

(C) For organic sulfides (VOC's) controlled by the Flare, the value for a day's VOC emissions calculated pursuant to Condition I.2.3(c)(1)(C) shall be multiplied by the ratio of the amount of time organic sulfides were vented

to the Flare and divided by the amount of time in such a calendar day that any organic sulfides were generated.

(3) If the Permittee fails to monitor and record the amount of time that a type of control device was in use during a calendar day, the VOC emissions for that day shall be calculated assuming that, among all the types of control devices used during that day, the type of control device used that results in the highest VOC emissions was used for the entire day.

(d) The gas chromatograph (GC) (also known as the sulfur GC) shall operate as follows:

(1) The GC shall operate during all periods of operation of the carbon monoxide generators except for GC breakdowns and repairs. Data is recorded during calibration checks, and zero and span adjustments.

(2) At such time that the GC detects carbonyl sulfide at a level of 150 ppmv, carbon disulfide at a level of 10 ppmv, or hydrogen sulfide at a level of 50 ppmv in the carbon monoxide stream from the carbon adsorber, the appropriate carbon adsorber shall be taken off-line immediately and the carbon monoxide feed shall be sent to another carbon adsorber.

I.2.4 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

(a) In order to demonstrate compliance with Condition I.2.1(b), the Permittee shall perform VOC testing for the COS Vent Oxidizer when organic sulfides are being vented to them using methods as approved by the Commissioner, on or before September 4, 2008. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing.

(b) If the Permittee makes any change or modification to the COS Vent Oxidizer to affect the conversion of organic sulfides (VOC emissions), the Permittee shall perform a compliance stack test for organic sulfides within 60 days after achieving the maximum production rate but no later than 180 days after making such change or modification. The new organic sulfides emissions level determined by the compliance stack test shall, beginning ten (10) business days after OAQ receives the test report for the compliance stack test, be used by the Permittee to calculate compliance with the VOC emissions limit in Condition I.2.1(b).

(c) The Permittee shall not make any change or modification to the COS Flare to affect the conversion of organic sulfides without the prior written approval of IDEM, OAQ.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)][326 IAC 2-7-5(1)]

I.2.5 Volatile Organic Compounds (VOC) and Sulfur Dioxide (SO_2) from the COS stream

(a) To ensure that the COS Vent Oxidizer operates at a destruction efficiency for organic sulfides of 99%, or other destruction efficiency used in the equation in Condition I.2.3(c)(1)(B), when organic sulfides are vented to the COS Vent Oxidizer, the COS Vent Oxidizer shall maintain a minimum operating temperature of 1,200°F, or a temperature determined in the most recent compliance stack test. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the operating temperature average is below the established minimum temperature, the Permittee shall take reasonable steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition I.2.1(b) of this permit.

(b) When the COS stream is being vented to the COS Flare to control organic sulfides emissions from the LEXAN# production facility, the presence of a flare pilot flame (for COS flare) shall be monitored using a thermocouple or any other equivalent device, to detect the presence of a flame and to sound an alarm when the flame is not detected.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

I.2.6 Record Keeping Requirements

(a) To document compliance with Conditions I.2.1 and I.2.3 the Permittee shall maintain the following records:

(1) Identity of each type of control device (oxidizer or flare, or boilers as described in Section K) to which the COS stream is vented for Organic Sulfide control and the amount of time during a calendar day that the type of control device is in use, except failure to maintain such records and calculating compliance pursuant to Condition I.2.3(c)(3) shall not be a deviation from this requirement.

(2) The total daily sulfur input, and the 365-day rolling total of total daily sulfur input, to the E BOILER, L BOILER, and V BOILER and carbon monoxide generators.

(3) Daily analyses of sulfur content of coke received for use by the carbon monoxide generators.

(4) The weight of VOCs emitted each day and the 365-day rolling total of the weight of VOCs emitted from the emission units V-723 and V-519, and the COS stream (involved in the 1995 or 1996 resin expansion project), considering capture and destruction (or removal) efficiency. This record should include the weight of organic sulfides emitted each day from each type of control device (boilers; oxidizer; flare), calculated pursuant to Condition I.2.3(c).

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(6) The measured operating temperature of the LEXAN# COS Vent Oxidizer during periods when used as an organic sulfides control device.

(7) Records of flame presence at the LEXAN# COS Flare during periods when used as an organic sulfides control device.

(d) All records required to be maintained by Condition I.2.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

I.2.7 Reporting Requirements

A quarterly summary of the information to document compliance with Condition I.2.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34). [The reporting form for documenting compliance with Condition I.2.1(b) is located at the end of Section K of this permit]

SECTION I.3 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Phosgene, Building 6

Phosgene Heat Exchange System and Area Waste

(c) The Phosgene heat exchange system includes cooling towers identified as PHG CTC1, PHG CTC2, PHG CTC3, PHG CTC4, PHG CTC5, PHG CTC6, PHG CTC7, PHG CTC8.

(d) The Phosgene area waste includes a process wastewater stream discarded from the LxrPPPU which does not contain a total annual average concentration of organic HAP's listed in table 9 of 40 CFR 63, Subpart G greater than or equal to 1,000 parts per million by weight with an annual average flow rate greater than or equal to 10 liters per minute. This wastewater stream is identified as 1"-MWS-A-73C-028 and is associated with P&ID No. 900-F-73C; this stream is described as a Neutralizer Tank V-951 (Aqueous phase). For clarification purposes, general requirements for the LxrPPPU can be found in Section G.1 of this permit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

I.3.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit, any change or modification which increases the total VOC emissions from emission units PHG CTC1, PHG CTC2, PHG CTC3, PHG CTC4, PHG CTC5, PHG CTC6, and from the emission units included in Conditions G.2.1(b), G.3.1, H.2.1, I.1.1, and J.1.1 of this Part 70 permit, to 25.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions G.2.1, G.3.1, H.2.1, I.1.1, I.2.1, J.1.1, and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

I.3.2 Record Keeping Requirements

(a) Pursuant to 40 CFR 63, Subpart YY, the Permittee shall comply with the HON process wastewater requirements in 40 CFR 63.132 through 63.148, Subpart G except as otherwise specified in 40 CFR 63.1106. Accordingly, pursuant to 40 CFR 63.132(c), the LxrPPPU process wastewater stream identified as 1"-MWS-A-73C-028 associated with the Phosgene area in P&ID No. 900-F-73C and described as a Neutralizer Tank V-951 (Aqueous phase) is Group 2, therefore, pursuant to 40 CFR 63.132(a)(3), the Permittee shall only comply with the applicable recordkeeping requirements specified in 63.147(b)(8) and 63.147(f) for this process wastewater stream.

(b) All records required to be maintained by Condition I.3.2 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Section I consists of the following Sections: I.1, I.2, I.3, and two (2) Part 70 Usage Report forms.

Condition I.3.2 concludes the Section I requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION
Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, IN 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, IN 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition I.2.1(a)
Facility: CO Generators
Parameter: SO_2
Limit: The overall total sulfur input to the carbon monoxide generators and the coal-fired boilers listed in Condition K.2.1(a)(1) shall not exceed 2,536.75 tons in any 365-day period, rolled on a daily basis.

Year: _____Month: _____

Day	Sulfur input this day (tons/day)	Sulfur input for the last 365-day period (tons)	Day	Sulfur input this day (tons/day)	Sulfur input for the last 365-day period (tons)
1			17		
2			18		
3			19		
4			20		
5			21		
6			22		
7			23		
8			24		
9			25		
10			26		
11			27		
12			28		
13			29		
14			30		
15			31		
16			no. of deviations		

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION
Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, IN 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, IN 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition I.2.1(c) and (d)
Facility: CO Generators
Parameter: SO_2
Limit: When using the COS Vent Oxidizer or the COS flare, the total sulfur input to the carbon monoxide generators shall be limited to 928.65 tons per 365-day period, rolled on a daily basis.

Year: _____Month: _____

Day	Sulfur Input this day (ton/day)	Sulfur Input for the last 365-day period	Day	Sulfur Input this day (ton/day)	Sulfur Input for the last 365-day period
1			**17**		
2			**18**		
3			**19**		
4			**20**		
5			**21**		
6			**22**		
7			**23**		
8			**24**		
9			**25**		
10			**26**		
11			**27**		
12			**28**		
13			**29**		
14			**30**		
15			**31**		
16			**no. of deviations**		

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

SECTION J.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: LEXAN# Finishing, Building 13

LEXAN# Finishing Operations

(a) The LEXAN# Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-148	SILO 67	RESIN SILO 67	None	Filter	32.5 tons/hour	N/A
07-149	SILO 68	RESIN SILO 68	None	Filter	32.5 tons/hour	N/A
07-156	SILO 69	RESIN SILO 69	None	Filter	32.5 tons/hour	N/A
07-157	SILO 70	RESIN SILO 70	None	Filter	32.5 tons/hour	N/A
07-188	SILO 71	RESIN SILO 71	None	Filter	32.5 tons/hour	1995

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-001	CMEX	COLOR MATCHING EXTRUDER	None	None	less than 100 lb/hr	N/A
07-002	MM4	MOLDING MACHINE #4	None	None	less than 100 lb/hr	N/A
07-002	MM5	MOLDING MACHINE #5	None	None	less than 100 lb/hr	N/A
07-002	MM6	MOLDING MACHINE #6	None	None	less than 100 lb/hr	N/A
07-011	QAFOH	QA FLAME OUT HOOD	None	None	less than 100 lb/hr	N/A
07-012	QAAH	QA ASHING HOOD	None	None	less than 100 lb/hr	N/A
07-013	QA SP HOOD	QA SAMPLE PREPARATION HOOD	None	None	less than 100 lb/hr	N/A
07-015	L-20 PB	LINE 20 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-016	L-21 PB	LINE 21 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	2.5 tons/hour	N/A
07-017	M&N DUST	M & N VERTIMIXERS BAGHOUSE	None	Filter	0.63 tons/hour	N/A
07-018	L-22 PB	LINE 22 POWDER BIN FILTER	None	Filter	2.30 tons/hour	N/A
07-019	L-23 PB	LINE 23 POWDER BIN FILTER	None	Filter	1.13 tons/hour	N/A
07-020	L-24 PB	LINE 24 POWDER BIN FILTER	None	Filter	2.48 tons/hour	N/A
07-022	L-25 PB	LINE 25 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-023	SP1-BF	POT #1 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-024	SPA-BF	POT A BAG HOUSE	None	Filter	7.5 tons/hour	N/A

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FACILITY DESCRIPTIONS: LEXAN# Finishing, Building 13

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-025	L-26PR	LINE 26 POWDER BIN FILTER	None	Filter	1.75 tons/hour	N/A
07-026	L-27PB	LINE 27 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-027	L-28PB	LINE 28 POWDER BIN FILTER	None	Filter	4.25 tons/hour	N/A
07-028	L-29PB	LINE 29 POWDER BIN FILTER	None	Filter	4.25 tons/hour	N/A
07-029	SPB-BF	POT B BAG HOUSE	None	Filter	7.5 tons/hour	N/A
07-030	L-30PB	LINE 30 POWDER BIN FILTER	None	Filter	3.25 tons/hour	N/A
07-031	L-31PB	LINE 31 POWDER BIN FILTER	None	Filter	3.25 tons/hour	N/A
07-032	SILO 57 RH	RESIN SILO 57	None	Filter	32.5 tons/hour	N/A
07-033	SILO 58 RH	RESIN SILO 58	None	Filter	32.5 tons/hour	N/A
07-034	L-28 RH	LINE #28 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-035	L-27 RH	LINE #27 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-036	L-26 RH	LINE #26 ROOF HOPPER BAG HOUSE	None	Filter	1.75 tons/hour	N/A
07-037	L-25 RH	LINE #25 ROOF HOPPER BAG HOUSE	None	Filter	2.75 tons/hour	N/A
07-038	L-24 RH	LINE #24 ROOF HOPPER BAG HOUSE	None	Filter	2.75 tons/hour	N/A
07-039	L-23 RH	LINE #23 ROOF HOPPER BAG HOUSE	None	Filter	1.25 tons/hour	N/A
07-040	L-22 RH	LINE #22 ROOF HOPPER BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-041	L-21 RH	LINE #21 ROOF HOPPER BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-042	L-20 RH	LINE #20 ROOF HOPPER BAG HOUSE	None	Filter	1.75 tons/hour	N/A
07-043	SILO 59RH	RESIN SILO 59	None	Filter	32.5 tons/hour	N/A
07-044	SILO 60 RH	RESIN SILO 60	None	Filter	32.5 tons/hour	N/A
07-045	SILO 61 RH	RESIN SILO 61	None	Filter	32.5 tons/hour	N/A
07-046	SILO 62 RH	RESIN SILO 62	None	Filter	32.5 tons/hour	N/A
07-049	L-10 BV	LINE #10 ROOF HOPPER BAGHOUSE	None	Filter	1.25 tons/hour	N/A
07-050	L-11 BV	LINE #11 ROOF HOPPER BAGHOUSE	None	Filter	1.75 tons/hour	N/A
07-051	L-12 BV	LINE #12 ROOF HOPPER BAGHOUSE	None	Filter	1.25 tons/hour	N/A

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-052	L-13 BV	LINE #13 ROOF HOPPER BAGHOUSE	None	Filter	0.55 tons/hour	N/A
07-053	L-14 BV	LINE #14 ROOF HOPPER BAGHOUSE	None	Filter	1.5 tons/hour	N/A
07-054	L16ED	LINE 16 EXTRUDER, DIE AND VACUUM VENT	None	None	0.75 tons/hour	N/A
07-055	L-15 RH	LINE #15 ROOF HOPPER BAGHOUSE	None	Filter	1.5 tons/hour	N/A
07-056	L-16 RH	LINE #16 ROOF HOPPER BAGHOUSE	None	Filter	0.75 tons/hour	N/A
07-057	L-17 RH	LINE #17 ROOF HOPPER BAGHOUSE	None	Filter	0.75 tons/hour	N/A
07-059	L13ED	LINE 13 EXTRUDER AND DIE VENT	None	None	0.55 tons/hour	N/A
07-060	L17ED	LINE 17 EXTRUDER, DIE AND VACUUM VENT	None	None	0.75 tons/hour	N/A
07-061	L15ED	LINE 15 EXTRUDER AND DIE VENT	None	None	1.5 tons/hour	N/A
07-062	L14ED	LINE 14 EXTRUDER AND DIE VENT	None	None	1.5 tons/hour	N/A
07-063	L27ED	LINE 27 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-064	L10 ED	LINE 10 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-065	L11ED	LINE 11 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-066	L12ED	LINE 12 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-067	L26ED	LINE 26 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-069	L24ED	LINES 23, 24 & 25 EXTRUDER, DIE AND VACUUM VENTS THROUGH HEAF #2 (SOUTH)	HEAF1 or HEAF2	None	N/A	N/A
07-070	L23ED	LINES 23, 24 & 25 EXTRUDER, DIE AND VACUUM VENTS THROUGH HEAF #1 (NORTH)	HEAF1 or HEAF2	None	N/A	N/A
07-070	L25ED	LINE 25 EXTRUDER AND DIE VENT	HEAF1 or HEAF2	None	N/A	N/A
07-071	L22ED	LINE 22 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-072	L21ED	LINE 21 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-073	L20ED	LINE 20 EXTRUDER AND DIE VENT	None	None	1.75 tons/hour	N/A
07-075	PBAGGER 1	POWDER BAGGER #1 ROOF HOPPER RECEIVER	None	Filter	7.5 tons/hour	N/A
07-076	DFOST	DIESEL FUEL OIL STORAGE TANK	None	None	N/A	N/A
07-079	PDC-C	PACKAGING DUST COLLECTOR C BAG HOUSE	None	Filter	0.55 tons/hour	N/A
07-080	PDC-D	PACKAGING DUST COLLECTOR D BAG HOUSE	None	Filter	0.55 tons/hour	N/A

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-086	REC FIL E	RECYCLE BAG HOUSE BLOWER E	None	Filter	8.35 tons/hour	N/A
07-087	REC FIL F	RECYCLE BAG HOUSE BLOWER F	None	Filter	8.35 tons/hour	N/A
07-092	L10EVP	Line 10 Extruder Vacuum Pump	None	None	1.25 tons/hour	N/A
07-092	L11EVP	Line 11 Extruder Vacuum Pump	None	None	1.75 tons/hour	N/A
07-092	L15EVP	Line 15 Extruder Vacuum Pump	None	None	1.5 tons/hour	N/A
07-092	L17EVP	LINE 17 EXTRUDER VACUUM PUMP	None	None	0.75 tons/hour	N/A
07-094	SILO 63	RESIN SILO 63	None	Filter	32.5 tons/hour	N/A
07-095	SILO 64	RESIN SILO 64	None	Filter	32.5 tons/hour	N/A
07-096	SILO 65	RESIN SILO 65	None	Filter	32.5 tons/hour	N/A
07-097	SILO 66	RESIN SILO 66	None	Filter	32.5 tons/hour	N/A
07-098	TRUCK FIL	BULK POWDER TRUCK LOADING STATION #1	None	Filter	7.5 tons/hour	N/A
07-099	SP2-BF	POT #2 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-100	SP3-BF	POT #3 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-101	L28ED	LINE 28 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-104	VPL-29	LINE 29 VACUUM PUMP	None	None	4.25 tons/hour	N/A
07-104	VPL-30	LINE 30 VACUUM PUMP	None	None	3.25 tons/hour	N/A
07-104	VPL-31	LINE 31 VACUUM PUMP	None	None	3.25 tons/hour	N/A
07-105	L29ED	LINE 29 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-106	L30ED	LINE 30 EXTRUDER AND DIE VENT	None	None	3.25 tons/hour	N/A
07-107	L31ED	LINE 31 EXTRUDER AND DIE VENT	None	None	3.25 tons/hour	N/A
07-108	L-29 RH	LINE #29 ROOF HOPPER BAG HOUSE	None	Filter	4.25 tons/hour	N/A
07-109	L-30 RH	LINE #30 ROOF HOPPER BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-110	L-31 RH	LINE #31 ROOF HOPPER BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-115	CVSA	CENTRAL VACUUM SYSTEM A BAG HOUSE	None	Filter	1.25 tons/hour	N/A
07-116	CVSB	CENTRAL VACUUM SYSTEM B BAG HOUSE	None	Filter	1.25 tons/hour	N/A

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-117	REC FIL G	RECYCLE BAG HOUSE BLOWER G	None	Filter	8.35 tons/hour	N/A
07-119	SAVS	PAD VACUUM BAG HOUSE	None	Filter	0.25 tons/hour	N/A
07-120	DC-6	CPF ROOF HOPPERS BAG HOUSE (C1, C2, C7 & C10)	None	Cartridge Filter and Cyclones	1.5 tons/hour	N/A
07-121	20-S-C9-02	LINES C7, C20 & C22 ROTOCLONE	None	None	7.2 tons/hour	N/A
07-122	10-S-10NPI	C3, C5 NPI EXTRUDER FEED HOPPERS	None	Filter	0.9 tons/hour	N/A
07-123	C14/16 ROT	LINES C14/16 BLENDER ROTOCLONE	None	None	3.75 tons/hour	N/A
07-126	LC2D	LINE C2 EXTRUDER AND DIE VENT	None	None	0.7 tons/hour	N/A
07-127	LC1D	LINE C1 & C3 EXTRUDER AND DIE VENT	None	None	0.9 tons/hour	N/A
07-127	LC3D	LINE C3 EXTRUDER AND DIE VENT	None	None	0.9 tons/hour	N/A
07-128	LC7D	LINE C7 EXTRUDER AND DIE VENT	None	None	0.45 tons/hour	N/A
07-130	LC14D	LINE C14 EXTRUDER AND DIE VENT	None	None	1.25 tons/hour	N/A
07-131	LC14V	LINE C14 CPF VACUUM	None	None	1.25 tons/hour	N/A
07-131	LC16V	LINE C16 CPF VACUUM	None	None	2.5 tons/hour	N/A
07-131	LC18V	LINE C18 CPF VACUUM	None	None	2.5 tons/hour	N/A
07-132	WCV	CPF CENTRAL VACUUM SYSTEM BAG HOUSES	None	None	1.25 tons/hour	N/A
07-134	20-M-C1-01	CPF ROTOCLONE SYSTEM FOR BLENDER C1	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C10-1	CPF ROTOCLONE SYSTEM FOR BLENDER C10	None	CPF ES ROT	less than 100 lb/hr	N/A
07-134	20-M-C2-01	CPF ROTOCLONE SYSTEM FOR BLENDER C2	None	CPF ES ROT	less than 100 lb/hr	N/A
07-134	20-M-C3-01	CPF ROTOCLONE SYSTEM FOR BLENDER C3	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C7-01	CPF ROTOCLONE SYSTEM FOR BLENDER C7	None	CPF OS ROT	less than 100 lb/hr	N/A
07-134	20-M-C8-01	CPF ROTOCLONE SYSTEM FOR BLENDER C8	None	CPF ES ROT	less than 100 lb/hr	N/A
07-135	VTBC14	LINE C14 & C16 VACUUM RECEIVER BLOWER	None	Filter	3.75 tons/hour	N/A
07-136	CMM1	CPF MOLDING MACHINE #1	None	None	less than 100 lb/hr	N/A
07-136	CMM2	CPF MOLDING MACHINE #2	None	None	less than 100 lb/hr	N/A
07-136	CMM3	CPF MOLDING MACHINE #3	None	None	less than 100 lb/hr	N/A

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-137	BVC1	LINES C1 & C7 VACUUM VENT	None	None	0.75 tons/hour	N/A
07-137	BVC3	CPF BARREL VACUUM VENT C3	None	None	0.3 tons/hour	N/A
07-137	BVC5	CPF BARREL VACUUM VENT C5	None	None	0.45 tons/hour	N/A
07-137	BVC7	CPF BARREL VACUUM VENT C7	None	None	0.45 tons/hour	N/A
07-139	BVC2	CPF BARREL VACUUM VENT C2	None	None	0.7 tons/hour	N/A
07-150	L-14PPC	LINE #14 PPC ROOF HOPPER BAG HOUSE	None	Filter	1.5 tons/hour	N/A
07-153	VDCS	BINS 51-56 AND K & L VERT DUST COLLECTOR	None	None	12.5 tons/hour	N/A
07-154	FGHJ VDC	F, G, H & J VERT DUST COLLECTOR	None	None	12.5 tons/hour	N/A
07-159	LC16D	LINE C16 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-159	LC18D	LINE C18 DIE VENT	None	None	2.5 tons/hour	N/A
07-161	SS1 BV	CO581 SAN SILO BAG HOUSE	None	Filter	1.35 tons/hour	N/A
07-162	SAN-RH	CO581 SAN ROOF HOPPER RECEIVER	None	Filter	1.35 tons/hour	N/A
07-163	ASC HCF	LINE 23, 24 & 25 ACRYLO SAN CO556 HOPPER CARTRIDGE FILTER	None	Filter	0.75 tons/hour	N/A
07-164	L23/24 SH	CO581 SAN ROOF HOPPER CARTRIDGE FILTER	None	Filter	1.35 tons/hour	N/A
07-166	HRG UL DC	SAN & HRG UNLOADING RECEIVER	None	Filter	3.5 tons/hour	N/A
07-167	HRG S1C	C29292 HRG SILO RECEIVER	None	Filter	2 tons/hour	N/A
07-168	HRG S2C	C29170 HRG SILO RECEIVER	None	Filter	2 tons/hour	N/A
07-169	HRG SILO 1	C29292 HRG SILO CONSERVATION VENT	None	None	2 tons/hour	N/A
07-170	HRG SILO 2	C29170 HRG SILO CONSERVATION VENT	None	None	2 tons/hour	N/A
07-171	HRG S1 DRV	C29292 HRG SILO ROTARY VALVE VENT	None	None	2 tons/hour	N/A
07-172	HRG S2 DRV	C29170 HRG SILO ROTARY VALVE VENT	None	None	2 tons/hour	N/A
07-173	HRG L23/24	LINES 23 & 24 HRG ROOF HOPPER RECEIVER	None	Filter	2.1 tons/hour	N/A
07-175	HRG 23/241	LINES 23 & 24 HRG ROOF HOPPER CONSERVATION VENT	None	None	2.1 tons/hour	N/A
07-176	HRG 23/242	LINES 23 & 24 HRG ROOF HOPPER CONSERVATION VENT	None	None	2.1 tons/hour	N/A
07-177	RDPST	RDP STORAGE TANK	None	None	N/A	N/A
07-180	RL23	LINE 23 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	1.25 tons/hour	N/A
07-182	RL24	LINE 24 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A

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Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-183	L30AF-BV	L30 ADDITIVE FEEDER BIN	None	L30 ROTO	less than 100 lb/hr	N/A
07-183	L30FT BV	CART. FILTER 13-PA037	None	L30 ROTO	less than 100 lb/hr	N/A
07-185	C3EVP	LINE C3 VACUUM VENT	None	None	0.3 tons/hour	N/A
07-186	C5EVP	LINE C5 VACUUM VENT	None	None	0.45 tons/hour	N/A
07-192	RPDH	BROWN BAG POWDER BAGGING DUST COLLECTOR	None	Filter	0.65 tons/hour	N/A
07-194	RGT/CRG	REGRINDER C, D & E AND METAL DETECTION BAG HOUSE	None	Filter	25 tons/hour	N/A
07-195	CMH	COLOR MATCHING HOPPER BAG HOUSE	None	Filter	less than 100 lb/hr	N/A
07-197	BCB	STARTUP/RECYCLE DUST COLLECTOR SPARE BLOWER	None	Filter	6 tons/hour	N/A
07-199	L25/26XTH	LINES 25 & 26 XT HOPPER	None	Filter	4.5 tons/hour	N/A
07-200	L30/31B2RH	LINE #30 & 31 ROOF HOPPER #2 BAG HOUSE	None	Filter	6.5 tons/hour	N/A
07-201	L28/29B2RH	LINE #28 & 29 ROOF HOPPER #2 BAG HOUSE	None	Filter	8.5 tons/hour	N/A
07-202	L30CDC	LINE 30 STARTUP/RECYCLE BAG HOUSE	None	Filter	3.25 tons/hour	N/A
07-204	10-S-06	CPF RESIN BINS 1 THRU 5 BAG HOUSE	None	Filter	3.5 tons/hour	N/A
07-205	VTBC16	LINE C16 & C18 VACUUM RECEIVER	None	Filter	6 tons/hour	N/A
07-206	BF-BPTL	BULK POWDER TRUCK LOADING STATION #2	None	None	12.5 tons/hour	N/A
07-207	MM1	MOLDING MACHINES 7, 8 & 9	None	None	less than 100 lb/hr	N/A
07-208	EXT7	MOLDING MACHINE #10. MINI EXTRUDERS #7 & #8.	None	None	less than 100 lb/hr	N/A
07-208	EXT8	EXTRUDER 10 LAB SCALE EXTRUDER	None	None	less than 100 lb/hr	N/A
07-250	DC0101F	LINE 25 HRG ROOF HOPPER CONSERVATION VENT	None	None	0.83 tons/hour	N/A
07-251	L25MH	LINES 23, 24 & 25 SAN C8707 ROOF HOPPER CARTRIDGE FILTER	None	Filter	1.66 tons/hour	N/A
07-252	SGH	LINES 23, 24 & 25 SAN GEL HOPPER CARTRIDGE FILTER	None	Filter	1.66 tons/hour	N/A
07-255	L25RH	LINE 25 RECYCLE HOPPER CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-256	HSH1	LINE 25 ROTOCLONE	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	HSH2	L25 CONCENTRATE FEEDER	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	L25 FTC	L25 FEED THROAT HOPPER V-05-01	None	L25 ROTO	less than 100 lb/hr	N/A
07-256	L25 HF	L25 HRG FEEDER LW-04-04	None	L25 HRG FC L25 ROTO	less than 100 lb/hr	N/A

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Significant Activities[a]

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07-264	L25-HRG2	LINE 25 HRG ROOF HOPPER CONSERVATION VENT	None	None	0.83 tons/hour	N/A
07-266	C20-DHV	LINE C20 EXTRUDER AND DIE VENT	None	None	2.5 tons/hour	N/A
07-267	C20VP-Z5/7	LINE C20 VACUUM VENT	None	None	2.5 tons/hour	N/A
07-268	C20VACTB	LINES C20 & C22 RESIN RECEIVER BAG HOUSE	None	Filter	6.75 tons/hour	N/A
07-270	BSANSBV	C29355 SAN SILO CONSERVATION VENT	None	None	6.75 tons/hour	N/A
07-271	BSANSILODC	C29355 SAN SILO RECEIVER	None	Filter	6.75 tons/hour	N/A
07-272	BSAN-HV	C29355 SAN ROOF HOPPER CONSERVATION VENT	None	None	6.75 tons/hour	N/A
07-273	BSAN-HDC	C29355 SAN ROOF HOPPER RECEIVER	None	None	6.75 tons/hour	N/A
07-274	HRGL25DC	LINE 25 ROOF HOPPER RECEIVER	None	None	2.75 tons/hour	N/A
07-275	L23-25SHV	C29355 SAN SILO ROTARY VALVE VENT FILTER	None	None	6.75 tons/hour	N/A
07-276	CPF OQ	CPF OQ ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-277	C22 OQ	LINE C22 EXTRUDER AND DIE VENT	None	None	4.25 tons/hour	N/A
07-278	C22 OQ SS	LINE C22 SUPER SACK FILLING STATION	None	None	4.25 tons/hour	N/A
07-279	L27-29FV	LINES 27, 28 & 29 FEEDER ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-280	LC22VAC	LINE C22 VACUUM VENT	None	None	4.25 tons/hour	N/A
07-281	LC22R	LINE C22 ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-282	PB2-RHB	POWDER BAGGER #2 ROOF HOPPER BAGHOUSE	None	Filter	8.33 tons/hour	N/A
07-283	KM330DSR	KM330 DUMP STATION ROTOCLONE (LINES 12, 14, 15, 20 & 30)	None	ROTO	less than 100 lb/hr	N/A
07-286	L10-17RSYS	LINES 10 THRU 17 & C16 BULK HOPPER #1 ROTOCLONE SYSTEM	None	ROTO	less than 100 lb/hr	N/A
07-287	LC14RHVRB	LINE C14 ROOF HOPPER VACUUM RECEIVER BLOWER	None	Filter	6 tons/hour	N/A
07-289	L23/24SHCF	LINES 23 & 24 SAN GEL C0896 HOPPER CARTRIDGE FILTER	None	Filter	0.4 tons/hour	N/A
07-290	L27H2CF	LINE 27 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-292	L28SRUVH	LINE 28 STARTUP/RECYCLE UV HOPPER CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-293	L28SRNUVH	LINE 28 STARTUP/RECYCLE NON-UV HOPPER CARTRIDGE FILTER	None	Filter	4.25 tons/hour	N/A
07-295	L10BH1CF	LINE #10 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.25 tons/hour	N/A

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FACILITY DESCRIPTIONS: LEXAN# Finishing, Building 13

LEXAN# Finishing Operations

(a) The LEXAN# Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
07-296	L11BH1CF	LINE #11 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-297	L11BH2CF	LINE #11 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-298	L14BH2	LINE #14 BULK HOPPER #2 BAG HOUSE	None	Filter	2.5 tons/hour	N/A
07-299	L10/11BHR	LINE #10 & 11 BULK HOPPERS RECEIVER	None	Filter	3 tons/hour	N/A
07-300	L14BH2CF	LINE #14 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	1.5 tons/hour	N/A
07-301	LC7BH1CF	LINE C7 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	0.45 tons/hour	N/A
07-302	LC7BH2CF	LINE C7 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	0.45 tons/hour	N/A
07-304	L25BH2CF	LINE #25 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	2.75 tons/hour	N/A
07-305	L21BH2CF	LINE #21 BULK HOPPER #2 CARTRIDGE FILTER	None	Filter	2.5 tons/hour	N/A
07-306	L20BH1CF	LINE #20 BULK HOPPER #1 CARTRIDGE FILTER	None	Filter	1.75 tons/hour	N/A
07-307	S71TSDC	SILO 71 TRANSFER SYSTEM DUST COLLECTOR	None	N/A	32.5 tons/hour	N/A
07-308	S67TSDC	SILO 67 TRANSFER SYSTEM DUST COLLECTOR	None	N/A	32.5 tons/hour	N/A
07-309	L30SR754H1	LINE 30 STARTUP/RECYCLE 754 HOPPER 1	None	Filter	3.25 tons/hour	N/A
07-310	L30SR754H2	LINE 30 STARTUP/RECYCLE 701 HOPPER 2	None	Filter	3.25 tons/hour	N/A
07-332	BTLS1SV	BULK TRUCK LOADING STATION #1 SILO VENT	None	None	7.5 tons/hour	N/A
07-349	S/R DC SB	STARTUP/RECYCLE DUST COLLECTOR SPARE BLOWER	None	Filter	6 tons/hour	N/A
07-350	SILO SH1	RESIN SILO SHEET 1	None	Filter	12.5 tons/hour	N/A
07-351	SILO SH3	RESIN SILO SHEET 3	None	Filter	12.5 tons/hour	N/A
07-357	ROTOCL	L30-31 CARBON BLACK ROTOCLONE	None	ROTO	less than 100 lb/hr	N/A
07-352	SILO 72	RESIN SILO 72	None	Filter	25 tons/hour	N/A
07-353	10FD-C2-03	C2 BIN VENT A	None	Filter	0.5 tons/hour	N/A
07-354	10FD-C2-04	C2 BIN VENT B	None	Filter	0.5 tons/hour	N/A
07-355	10FDS73-01	SILO 73 BIN VENT	None	Filter	20 tons/hour	N/A
07-358	R SILO 74	RESIN SILO 74 BIN VENT	None	Filter	35.00 tons/hour	N/A
07-359	S74DTDCEB	SILO 74 DIRECT TRANSFER DUST COLLECTOR EXHAUST BLOWER	None	Filter	0.5 tons/hour	N/A

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FACILITY DESCRIPTIONS: LEXAN# Finishing, Building 13

LEXAN# Finishing Operations

(a) The LEXAN# Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
07-360	10-GB-BL-0	SILO 74 TRUCK 1 LOADING COLLECTOR EXHAUST BLOWER	None	Filter	1.00 tons/hour	N/A

[(a)] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[(b)] Equipment is integral to the process operation.
[(c)] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[(d)] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

J.1.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to SSM 129-14373-00002, Condition D.1.1, issued on May 9, 2002, as revised through the Title V permit, any change or modification which increases the total VOC emissions from emission units SILO 67, SILO 68, SILO 69, M&N DUST, SP1-BF, SPA-BF, SPB-BF, SILO 57 RH, SILO 58 RH, L-28 RH, L-27 RH, L-26 RH, L-25 RH, L-24 RH, L-23 RH, L-22 RH, L-21 RH, L-20 RH, SILO 59 RH, SILO 60 RH, SILO 61 RH, SILO 62 RH, L-10 BV, L-11 BV, L-13 BV, L-14 BV, L16ED, L-15 RH, L-16 RH, L-17 RH, L13ED, L17ED, L15ED, L14ED, L27ED, L10ED, L11ED, L12ED, L26ED, L24ED, L23ED, L25ED, L22ED, L21ED, L20ED, SILO 64, SILO 65, SILO 66, SP2-BF, SP3-BF, L28ED, L29ED, L30ED, L31ED, L-29 RH, L-30 RH, L-31 RH, and from the emission units included in Conditions G.2.1, G.3.1, H.2.1, I.1.1, and I.3.1 of this Part 70 permit, to 25.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions G.2.1, G.3.1, H.2.1, I.1.1, I.2.1, I.3.1 and K.2.1(a)(2)) ensures that the total VOC emissions of the emission units involved in the 1995 and 1996 resin expansion project are less than 80.0 tons per year, the net emission increase from the 1995 and 1996 resin expansion project is less than 40 tons per year, and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

J.1.2 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the following emission units listed in the table below shall not exceed the calculated rates given in pounds per hour determined by use of the following equation:

Interpolation of the data for the process weight rates up to 60,000 pounds per hour shall be accomplished by use of the equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

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Interpolation and extrapolation of the data for the process weight rate in excess of sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$E = 55.0\ P^{0.11} - 40$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
07-148	SILO 67	32.5	40.7
07-149	SILO 68	32.5	40.7
07-156	SILO 69	32.5	40.7
07-157	SILO 70	32.5	40.7
07-188	SILO 71	32.5	40.7
07-015	L-20 PB	1.75	5.97
07-016	L-21 PB	2.50	7.58
07-017	M&N DUST	0.63	3.01
07-018	L-22 PB	2.30	7.16
07-019	L-23 PB	1.13	4.45
07-020	L-24 PB	2.48	7.53
07-022	L-25 PB	2.75	8.07
07-023	SP1-BF	3.50	9.49
07-024	SPA-BF	7.50	15.8
07-025	L-26PR	1.75	5.97
07-026	L-27PB	4.25	10.8
07-027	L-28PB	4.25	10.8
07-028	L-29PB	4.25	10.8
07-029	SPB-BF	7.50	15.8
07-030	L-30PB	3.25	9.03
07-031	L-31PB	3.25	9.03
07-032	SILO 57 RH	32.50	40.7
07-033	SILO 58 RH	32.50	40.7
07-034	L-28 RH	4.25	10.8
07-035	L-27 RH	4.25	10.8
07-036	L-26 RH	1.75	5.97
07-037	L-25 RH	2.75	8.07
07-038	L-24 RH	2.75	8.07
07-039	L-23 RH	1.25	4.76
07-040	L-22 RH	2.50	7.58
07-041	L-21 RH	2.50	7.58
07-042	L-20 RH	1.75	5.97
07-043	SILO 59RH	32.50	40.7
07-044	SILO 60 RH	32.50	40.7
07-045	SILO 61 RH	32.50	40.7
07-046	SILO 62 RH	32.50	40.7
07-049	L-10 BV	1.25	4.76
07-050	L-11 BV	1.75	5.97
07-051	L-12 BV	1.25	4.76
07-052	L-13 BV	0.55	2.75
07-053	L-14 BV	1.50	5.38
07-054	L16ED	0.75	3.38
07-055	L-15 RH	1.50	5.38
07-056	L-16 RH	0.75	3.38
07-057	L-17 RH	0.75	3.38
07-059	L13ED	0.55	2.75
07-060	L17ED	0.75	3.38
07-061	L15ED	1.50	5.38
07-062	L14ED	1.50	5.38
07-063	L27ED	4.25	10.8
07-064	L10 ED	1.25	4.76

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
07-065	L11ED	1.75	5.97
07-066	L12ED	1.25	4.76
07-067	L26ED	1.75	5.97
07-071	L22ED	2.50	7.58
07-072	L21ED	2.50	7.58
07-073	L20ED	1.75	5.97
07-075	PBAGGER 1	7.50	15.8
07-079	PDC-C	0.55	2.75
07-080	PDC-D	0.55	2.75
07-086	REC FIL E	8.35	17.0
07-087	REC FIL F	8.35	17.0
07-092	L10EVP	1.25	4.76
07-092	L11EVP	1.75	5.97
07-092	L15EVP	1.50	5.38
07-092	L17EVP	0.75	3.38
07-094	SILO 63	32.50	40.7
07-095	SILO 64	32.50	40.7
07-096	SILO 65	32.50	40.7
07-097	SILO 66	32.50	40.7
07-098	TRUCK FIL	7.50	15.8
07-099	SP2-BF	3.50	9.49
07-100	SP3-BF	3.50	9.49
07-101	L28ED	4.25	10.8
07-104	VPL-29	4.25	10.8
07-104	VPL-30	3.25	9.03
07-104	VPL-31	3.25	9.03
07-105	L29ED	4.25	10.8
07-106	L30ED	3.25	9.03
07-107	L31ED	3.25	9.03
07-108	L-29 RH	4.25	10.8
07-109	L-30 RH	3.25	9.03
07-110	L-31 RH	3.25	9.03
07-115	CVSA	1.25	4.76
07-116	CVSB	1.25	4.76
07-117	REC FIL G	8.35	17.0
07-119	SAVS	0.25	1.62
07-120	DC-6	1.50	5.38
07-121	20-S-C9-02	7.20	15.4
07-122	10-S-10NPI	0.9	3.82
07-123	C14/16 ROT	3.75	9.94
07-126	LC2D	0.70	3.23
07-127	LC1D	0.90	3.82
07-127	LC3D	0.90	3.82
07-128	LC5D	0.90	3.82
07-128	LC7D	0.45	2.40
07-130	LC14D	1.25	4.76
07-131	LC14V	1.25	4.76
07-131	LC16V	2.50	7.58
07-131	LC18V	2.50	7.58
07-132	WCV	1.25	4.76
07-135	VTBC14	3.75	9.94
07-137	BVC1	0.75	3.38
07-137	BVC3	0.30	1.83
07-137	BVC5	0.45	2.40
07-137	BVC7	0.45	2.40
07-139	BVC2	0.70	3.23
07-150	L-14PPC	1.50	5.38
07-153	VDCS	12.50	22.3
07-154	FGHJ VDC	12.50	22.3
07-159	LC16D	2.50	7.58
07-159	LC18D	2.50	7.58
07-161	SS1 BV	1.35	5.01

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Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
07-162	SAN-RH	1.35	5.01
07-163	ASC HCF	0.75	3.38
07-164	L23/24 SH	1.35	5.01
07-166	HRG UL DC	3.50	9.49
07-167	HRG S1C	2.00	6.52
07-168	HRG S2C	2.00	6.52
07-169	HRG SILO 1	2.00	6.52
07-170	HRG SILO 2	2.00	6.52
07-171	HRG S1 DRV	2.00	6.52
07-172	HRG S2 DRV	2.00	6.52
07-173	HRG L23/24	2.10	6.74
07-175	HRG 23/241	2.10	6.74
07-176	HRG 23/242	2.10	6.74
07-180	RL23	1.25	4.76
07-182	RL24	2.75	8.07
07-185	C3EVP	0.30	1.83
07-186	C5EVP	0.45	2.40
07-192	RPDH	0.65	3.07
07-194	RGT/CRG	25.00	35.4
07-197	BCB	6.00	13.6
07-199	L25/26XTH	4.50	11.2
07-200	L30/31B2RH	6.50	14.4
07-201	L28/29B2RH	8.50	17.2
07-202	L30CDC	3.25	9.03
07-204	10-S-06	3.50	9.49
07-205	VTBC16	6.00	13.6
07-206	BF-BPTL	12.50	22.3
07-250	DC0101F	0.83	3.62
07-251	L25MH	1.66	5.76
07-252	SGH	1.66	5.76
07-255	L25RH	2.75	8.07
07-264	L25-HRG2	0.83	3.62
07-266	C20-DHV	2.50	7.58
07-267	C20VP-Z5/7	2.50	7.58
07-268	C20VACTB	6.75	14.7
07-270	BSANSBV	6.75	14.7
07-271	BSANSILODC	6.75	14.7
07-272	BSAN-HV	6.75	14.7
07-273	BSAN-HDC	6.75	14.7
07-274	HRGL25DC	2.75	8.07
07-275	L23-25SHV	6.75	14.7
07-277	C22 OQ	4.25	10.8
07-278	C22 OQ SS	4.25	10.8
07-280	LC22VAC	4.25	10.8
07-282	PB2-RHB	8.33	17.0
07-287	LC14RHVRB	6.00	13.6
07-289	L23/24SHCF	0.40	2.22
07-290	L27H2CF	4.25	10.8
07-292	L28SRUVH	4.25	10.8
07-293	L28SRNUVH	4.25	10.8
07-295	L10BH1CF	1.25	4.76
07-296	L11BH1CF	1.75	5.97
07-297	L11BH2CF	1.75	5.97
07-298	L14BH2	2.50	7.58
07-299	L10/11BHR	3.00	8.56
07-300	L14BH2CF	1.50	5.38
07-301	LC7BH1CF	0.45	2.40
07-302	LC7BH2CF	0.45	2.40
07-304	L25BH2CF	2.75	8.07
07-305	L21BH2CF	2.50	7.58
07-306	L20BH1CF	1.75	5.97
07-307	S71TSDC	32.50	40.7

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Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
07-308	S67TSDC	32.50	40.7
07-309	L30SR754H1	3.25	9.03
07-310	L30SR754H2	3.25	9.03
07-332	BTLS1SV	7.50	15.8
07-349	S/R DC SB	6.00	13.6
07-350	SILO SH1	12.50	22.3
07-351	SILO SH3	12.50	22.3
07-352	SILO 72	25.00	35.4
07-353	10FD-C2-03	0.50	2.58
07-354	10FD-C2-04	0.50	2.58
07-355	10FDS73-01	20.00	30.5
07-358	R SILO 74	35.00	41.30
07-359	S74DTDCEB	0.50	2.58
07-360	10-GB-BL-0	1.00	4.10

(b) Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from MM1, EXT7, EXT8, CMH, CMM1, CMM2, CMM3, CMEX, MM4, MM5, MM6, QAFOH, QAAH, QA SP HOOD, 20-M-C1-01, 20-M-C10-1, 20-M-C2-01, 20-M-C3-01, 20-M-C7-01, 20-M-C8-01, L30AF-BV, L30FT BV, HSH1, HSH2, L25 FTC, L25 HF, CPF OQ, L27-29FV, LC22R, KM330DSR, L10-17RSYS, and ROTOCL shall not exceed 0.551 pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

J.1.3 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with J.1.2, the integral device associated with facilities SAVS, DC-6, 10-S-10NPI, 20-M-C10-1, 20-M-C8-01, 20-M-C2-01, 20-M-C1-01, 20-M-C3-01, 20-M-C5-01, 20-M-C7-01, L-20 PB, L-21 PB, M&N DUST, L-22 PB, L-23 PB, L-24 PB, L-25 PB, SILO 57 RH, SILO 58 RH, L-28 RH, L-27 RH, L-26 RH, L-25 RH, L-24 RH, L-23 RH, L-22 RH, L-21 RH, L-20 RH, SILO 59RH, SILO 60 RH, SILO 61 RH, SILO 62 RH, L-10 BV, L-11 BV, L-12 BV, L-13 BV, L-14 BV, L-15 RH, L-16 RH, L-17 RH, PBAGGER 1, PDC-C, PDC-D, REC FIL E, REC FIL F, SILO 63, SILO 64, SILO 65, SILO 66, TRUCK FIL, SP2-BF, SP3-BF, L-29 RH, L-30 RH, L-31 RH, CVSA, CVSB, REC FIL G, VTBC14, SILO 67, SILO 68, L-14PPC, SILO 69, SILO 70, SS1 BV, SAN-RH, ASC HCF, L23/24 SH, HRG UL DC, HRG S1C, HRG S2C, HRG L23/24, RL23, RL24, SILO 71, RPDH, RGT/CRG, CMH, BCB, L25/26XTH, L30/31B2RH, L28/29B2RH, L30CDC, 10-S-06, VTBC16, L25MH, SGH, L25RH, C20VACTB, BSANSILODC, LC14RHVRB, L23/24SHCF, L27H2CF, L28SRUVH, L28SRNUVH, L10BH1CF, L11BH1CF, L11BH2CF, L14BH2, L10/11BHR, L14BH2CF, LC7BH1CF, LC7BH2CF, L25BH2CF, L21BH2CF, L20BH1CF, L30SR754H1, L30SR754H2, S/R DC SB, SILO SH1, SILO SH3, SILO 72, L25 HF, HSH2, L25 FTC, HSH1, L30AF-BV, L30FT BV, CPF OQ, L27-29FV, LC22R, KM330DSR, L10-17RSYS, ROTOCL, 10FD-C2-03, 10FD-C2-04, 10FDS73-01, R SILO 74, S74DTDCEB, and 10-GB-BL-0 shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-5.1-3(e)(2)] [326 IAC 2-6.1-5(a)(2)]

J.1.4 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust for emission units L-27PB, L-28PB, L-29PB, L-28 RH, L-27 RH, L27ED, L28ED, VPL-29, L29ED, L-29 RH, C22 OQ, LC22VAC, L27H2CF, L28SRUVH, L28SRNUVH, L25/26XTH, BCB, VTBC16, LC14RHVRB, S/R DC SB, L30/31B2RH, C20VACTB, BSANSBV, BSANSILODC, BSAN-HV, BSAN-HDC, L23-25SHV, 20-S-C9-02, SPA-BF, SPB-BF, PBAGGER 1, TRUCK FIL, BTLS1SV, PB2-RHB, REC FIL E, REC FIL F, REC FIL G, L28/29B2RH, VDCS, FGHJ VDC, BF-BPTL, SILO SH1, SILO SH3, RGT/CRG, SILO 72, SILO 67, SILO 68, SILO 69, SILO 70, SILO 71, SILO 57 RH, SILO 58 RH, SILO 59RH, SILO 60 RH, SILO 61 RH, SILO 62 RH, SILO 63, SILO 64, SILO 65, SILO 66, S71TSDC, S67TSDC, 10FDS73-01, and R SILO 74 shall be

performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from the filter associated with L-27PB, L-28PB, L-29PB, L-28 RH, L-27 RH, L27ED, L28ED, VPL-29, L29ED, L-29 RH, C22 OQ, LC22VAC, L27H2CF, L28SRUVH, L28SRNUVH, L25/26XTH, BCB, VTBC16, LC14RHVRB, S/R DC SB, L30/31B2RH, C20VACTB, BSANSBV, BSANSILODC, BSAN-HV, BSAN-HDC, L23-25SHV, 20-S-C9-02, SPA-BF, SPB-BF, PBAGGER 1, TRUCK FIL, BTLS1SV, PB2-RHB, REC FIL E, REC FIL F, REC FIL G, L28/29B2RH, VDCS, FGHJ VDC, BF-BPTL, SILO SH1, SILO SH3, RGT/CRG, SILO 72, SILO 67, SILO 68, SILO 69, SILO 70, SILO 71, SILO 57 RH, SILO 58 RH, SILO 59RH, SILO 60 RH, SILO 61 RH, SILO 62 RH, SILO 63, SILO 64, SILO 65, SILO 66, S71TSDC, S67TSDC, 10FDS73-01, and R SILO 74 the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

J.1.5 Record Keeping Requirements

(a) To document compliance with Condition J.1.4, the Permittee shall maintain the weekly record of the visible emission notations required by Condition J.1.4(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition J.1.5 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Section J consists of the following Sections: J.1.

Condition J.1.5 concludes the Section J requirements of this permit

SECTION K.1 **[Reserved]**

SECTION K.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Boilerhouse I

BH I Boilers

(b) The boilers located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum heat input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit[d][e]	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001	BW-BOILER	B&W BOILER natural gas with/without supplemental hydrogen	None	None	173 MMBtu/hr	1975
09-002	E BOILER	ERIE BOILER coal fired	BHI Baghouse	None	249 MMBtu/hr	1975
09-002	L BOILER	LASKER BOILER coal fired	BHI Baghouse	None	128.7 MMBtu/hr (design)	1962
09-002	V BOILER	VOGT BOILER coal fired	BHI Baghouse	None	51.3 MMBtu/hr (design)	1959
09-106	R BOILER	RILEY BOILER natural gas fired	None	None	178.5 MMBtu/hr	1969

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) E Boiler, L Boiler, BW-Boiler, and R Boiler may be used for controlling organic sulfides from the COS stream. The COS stream is the regeneration gas stream created by carbon adsorbers used in the carbon monoxide generation/purification process; carbon monoxide is used in the LEXAN# production facility. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide. In addition to having the option to use the Erie Boiler, Lasker Boiler, B&W Boiler, or Riley Boiler for controlling these organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either an oxidizer (08-706) or flare (08-707). The oxidizer and flare are described in Section I of this permit. The flare (08-707) serves only as back-up to the oxidizer (08-706) and during safety interlock of the system.
(e) E Boiler, BW-Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream. The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S4 and S5. The SHEETFUMES stream may be vented to either the E Boiler or R Boiler for control.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

K.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

(a) Pursuant to Condition D.1.1 of permit SSM 129-14373-00002, issued on May 9, 2002, and to render the requirements of 326 IAC 2-2 not applicable, the following conditions as revised through the Title V permit shall apply to the boilers identified as E BOILER, L

BOILER, BW-BOILER, V BOILER or R BOILER, and the COS Vent Oxidizer and COS Flare listed in Condition I.2.1.

(1) The total sulfur input to E BOILER, L BOILER, and V BOILER (stack no. 09-002) and the carbon monoxide generators listed in Condition I.2.1(a) shall not exceed 2,536.75 tons in any 365-day period, rolled on a daily basis.

The sulfur inputs shall be determined according to the following equation:

*Daily Sulfur Input = Daily Coke Usage * (wt% Sulfur of Coke) + Daily Coal Usage * (wt% Sulfur of Coal)*

(2) The total emissions of organic sulfides from any control device to which the COS stream is vented shall be limited to 10.7 pounds VOC per hour or the rate determined in the most recent stack test of the E BOILER, L BOILER, or V BOILER such that the total VOC emissions from the COS stream and the resin vent gas absorbers identified as V-723 and V-519 in Section G.2 of this permit shall not exceed 55.0 tons per year and the emission units from the 1995 and 1996 resin expansion projects (the COS stream, the resin vent gas absorbers identified as V-723 and V-519, and the emission units included in Sections G.2, G.3, H.2, I.1, I.2, I.3, and J.1 of this Part 70 permit) shall have an emission increase of less than 40.0 tons VOC per year. This effectively limits the combination of emissions from the COS stream, the resin vent gas absorbers identified as V-723 and V-519, and the other emission units involved in the 1995 and 1996 resin expansion projects (the emission units included in Sections G.2, G.3, H.2, I.1, I.2, I.3, and J.1 of this Part 70 permit), to a total of 80.0 tons VOC per year (baseline emissions plus emission increase).

Compliance with these conditions and Conditions G.2.1(a) and I.2.1 will limit the increase in sulfur dioxide emissions and the volatile organic compound emissions to below 40 tons per year each. Therefore, the Prevention of Significant Deterioration (PSD) rules, 326 IAC 2-2, will not apply.

(b) Pursuant to CP 129-5500-00002, Condition 12, issued on September 30, 1996, the combined operating capacities of the E BOILER, L BOILER, and V BOILER shall be limited to a total of 325,000 pounds of steam per hour.

Compliance with this steam production limit and the sulfur dioxide and nitrogen oxide limits for boilers H-530A and H-530B pursuant to Condition E.4.1, limits the net increase in sulfur dioxide emissions and nitrogen oxide emissions to below 40 tons per year and renders the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

K.2.2 Volatile Organic Compounds (VOC) from C-41 and C-42 SHEETFUMES [326 IAC 2-2]

Whenever the C-41 and C-42 coating processes are operating and VOC emissions are vented to any of the three (3) boilers identified as the E BOILER, R BOILER, and BW-Boiler, as described in Section L of this permit, such boiler(s) shall maintain a minimum overall control efficiency of 95 % including capture and removal efficiencies. This control efficiency is required to limit the net emissions increase of VOC to less than 40 tons per 12 consecutive month period after the 1984 coating line construction.

Compliance with this Condition and the C-41 and C-42 production limitation as described in Condition L.2.1(a) is equivalent to 93 tons of VOC emissions per twelve (12) consecutive month period and is necessary to keep the net emission increase below PSD significant emission levels. These conditions render the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

K.2.3 [RESERVED]

K.2.4 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-1]

(a) Pursuant to 326 IAC 6-2-1(c), particulate emissions shall each be limited to 0.80 pounds per MMBtu of heat input for L BOILER, V BOILER, and R BOILER.

(b) Pursuant to 326 IAC 6-2-1(c), particulate emissions shall be limited to 0.42 pounds per MMBtu of heat input for E BOILER. This limitation was calculated using the following equation:

$$Pt = \frac{C \times a \times h}{76.5 \times Q^{0.75} \times N^{0.25}}.$$

where

C = 50 ug/m3
Pt = emission rate limit (lbs/MMBtu)
Q = 827.5 MMBtu/hr
N = 5 stacks
a = plume rise factor (0.67)
h = 220 ft stack height

(c) Pursuant to CP 65-01-94-0206, Condition 4, issued on March 23, 1990 and 326 IAC 6-2-1(g), particulate emissions shall be limited to 0.35 pounds per MMBtu of heat input for BW-BOILER.

K.2.5 Sulfur Dioxide (SO_2) [326 IAC 7-1.1]

(a) [RESERVED]

(b) Pursuant to 326 IAC 7-1.1 (Sulfur Dioxide Emission Limitations), the SO_2 emissions from the three (3) coal fired boilers, identified as E BOILER, L BOILER, and V BOILER shall each not exceed 6.0 pounds per million Btu (lbs/MMBtu).

K.2.6 [Reserved]

Compliance Determination Requirements

K.2.7 Volatile Organic Compounds (VOC) and Sulfur Dioxide (SO_2) from the COS stream

Pursuant to Condition D.1.1 of permit SSM 129-14373-00002, issued on May 9, 2002, and to render the requirements of 326 IAC 2-2 not applicable, the following conditions as revised through the Title V permit shall apply to the boilers identified as E BOILER, L BOILER, BW-BOILER, or R BOILER, and the COS Vent Oxidizer and COS Flare identified in Condition I.2.1.

(a) In order to comply with Condition K.2.1(a)(2), at least one of the control devices used for organic sulfide control (E BOILER, L BOILER, BW-BOILER, or R BOILER, or the COS Vent Oxidizer or COS Flare described in Section I) shall be in operation and control organic sulfide emissions from the COS stream at all times that the carbon monoxide generators described in I.2.1 are in operation.

(b) To determine compliance with Condition K.2.1(a)(1):

(1) The sulfur content of the coal used by L BOILER, E BOILER, and V BOILER shall be analyzed for each day the boilers operate; and

(2) The sulfur content of the coke used in the carbon monoxide generators described in Condition I.2.1 shall be analyzed as received (vendor delivery analysis may be

used, approved by IDEM on 8/1/05) for each day the carbon monoxide generators operate.

(c) To determine compliance with Condition K.2.1(a)(2) and whenever the COS stream is vented to two or more of the three types of control devices permitted for use (boilers described in this section; or oxidizer and flare as described in Section I) during a calendar day, VOC emissions shall be calculated as follows:

(1) When calculating daily VOC emissions from a specific control device, the Permittee shall use the following equations as appropriate:

(A) Daily VOC emissions from the E BOILER or L BOILER equals:

*(10.7 pounds organic sulfides per hour or the rate determined in the most recent stack test of the E BOILER or L BOILER) * (24 hours per day)*

(B) Daily VOC emissions from the COS Vent Oxidizer equals:

*Daily coke usage * (wt % sulfur of coke) * (60.075 lb-mol wt. of organic sulfides / 32.064 lb-mol wt. of sulfur) * (1 - destruction efficiency of oxidizer as determined in the most recent stack test)*

(C) Daily VOC emissions from the Flare equals:

*Daily coke usage * (wt % sulfur of coke) * (60.075 lb-mol wt. of organic sulfides / 32.064 lb-mol wt. of sulfur) * (1 - 0.99)*

(2) When calculating the total daily VOC emissions from more than one specific control device whenever the COS stream was vented to two or more of the three types of control devices permitted for use , the Permittee shall sum the organic sulfides emissions (VOC's) from each type of control device used during the day as follows:

(A) For organic sulfides (VOC's) controlled by E BOILER or L BOILER, the value for a day's VOC emissions shall be 10.7 pounds organic sulfides per hour, or the rate determined in the most recent stack test of the E BOILER, L BOILER, or V BOILER, multiplied by the number of hours the organic sulfides were vented to the E BOILER, L BOILER, or V BOILER; and

(B) For organic sulfides (VOC's) controlled by the COS Vent Oxidizer, the value for a day's VOC emissions calculated pursuant to Condition K.2.7(c)(1)(B) shall be multiplied by the ratio of the amount of time organic sulfides were vented to the COS Vent Oxidizer and divided by the amount of time in such a calendar day that any organic sulfides were generated; and

(C) For organic sulfides (VOC's) controlled by the Flare, the value for a day's VOC emissions calculated pursuant to Condition K.2.7(c)(1)(C) shall be multiplied by the ratio of the amount of time organic sulfides were vented to the Flare and divided by the amount of time in such a calendar day that any organic sulfides were generated.

(3) If the Permittee fails to monitor and record the amount of time that a type of control device was in use during a calendar day, the VOC emissions for that day shall be calculated assuming that, among all the types of control devices used

during that day, the type of control device used that results in the highest VOC emissions was used for the entire day.

K.2.8 Volatile Organic Compounds (VOC) from C-41 and C-42 SHEETFUMES [326 IAC 2-2]

To determine compliance with K.2.2, one or more of the three (3) boilers identified as the E BOILER, R BOILER, and BW-Boiler, shall operate at all times that the C-41 and C-42 coating lines, described in Section L of this permit, are operating while using VOC based coating.

K.2.9 [RESERVED]

K.2.10 Particulate Control

To demonstrate compliance with Condition K.2.4, the baghouse on E BOILER, L BOILER, and V BOILER, used for particulate control, shall be in operation and control particulate emissions from the facilities E BOILER, L BOILER, and V BOILER, at all times any of these facilities are in operation except during startup when the temperature is below 250 degrees F. The baghouse bypass damper shall be operated in the closed position or in a position no more open than the position documented in accordance with a valid compliance demonstration conducted pursuant to Condition K.2.12(g).

K.2.11 Sulfur Dioxide Emissions and Sulfur Content [326 IAC 3] [326 IAC 7-2] [326 IAC 7-1.1-2]

(a) [RESERVED]

(b) In order to demonstrate compliance with the SO_2 limits pursuant to Condition K.2.5(b), the Permittee shall demonstrate, using a calendar month average, that the sulfur dioxide emissions do not exceed the equivalent of six (6.0) pounds per MMBtu from the three (3) coal fired boilers, identified as E BOILER, L BOILER, and V BOILER when combusting coal. The Permittee may use one of the following methods pursuant to 326 IAC 7-2-1(e) and specified in 326 IAC 3-7:

(1) Pursuant to 326 IAC 7-2-1(e) and 326 IAC 3-7, coal sampling and analysis data for E BOILER, L BOILER, and V BOILER shall be collected as follows:

(A) Coal sampling shall be performed using the methods specified in 326 IAC 3-7-2(a), and sample preparation and analysis shall be performed as specified in 326 IAC 3-7-2(c), (d), and (e); or

(B) Pursuant to 326 IAC 3-7-2(b)(2) and 326 IAC 3-7-3, manual or other non-ASTM automatic sampling and analysis procedures may be used upon a demonstration, submitted to the department for approval, that such procedures provide sulfur dioxide emission estimates representative either of estimates based on coal sampling and analysis procedures specified in 326 IAC 3-7-2 or of continuous emissions monitoring; or

(C) The Permittee shall meet the minimum sampling requirements specified in 326 IAC 3-7-2(b)(3), and sample preparation and analysis shall be performed as specified in 326 IAC 3-7-2(c), (d), and (e).

(2) Upon written notification to IDEM by a facility owner or operator, continuous emission monitoring data collected and reported pursuant to 326 IAC 3-5 may be used as the means for determining compliance with the emission limitations in 326 IAC 7. Upon such notification, the other requirements of 326 IAC 7-2 shall not apply. [326 IAC 7-2-1(g)]

A determination of noncompliance pursuant to any of the methods specified in (a) or (b) above shall not be refuted by evidence of compliance pursuant to the other method.

K.2.12 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

(a) Within one hundred and eighty (180) days after the first use of the E BOILER or L BOILER to control organic sulfides after the effective date of this Part 70 permit, and in order to demonstrate compliance with Condition K.2.1(a)(2), the Permittee shall perform VOC testing for E BOILER and L BOILER when organic sulfides are being vented to them using methods as approved by the Commissioner. This test shall be repeated at least once every five (5) years thereafter from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing.

(b) If the Permittee chooses to control the COS stream using R BOILER and BW-BOILER, and in order to determine the minimum steam production rate necessary to ensure that organic sulfide emissions will not exceed 10.7 pounds per hour, or the rate determined in the most recent stack test conducted as required by Condition K.2.12(a), when using R BOILER or BW-BOILER for the destruction of organic sulfides as described in Condition K.2.1(a)(2), compliance stack tests shall be performed for organic sulfides on such boiler(s) upon venting the COS stream to such boiler(s) for the destruction of organic sulfides. These tests shall be performed within 60 days after achieving maximum production rate, but no later than 180 days after initial start-up. Testing shall be conducted in accordance with Section C- Performance Testing.

(c) If the Permittee makes any change or modification to the boilers R BOILER, BW-BOILER, L BOILER, and/or E BOILER to affect the conversion of organic sulfides, the Permittee shall perform a compliance stack test for organic sulfides within 60 days after achieving the maximum production rate but no later than 180 days after making such change or modification. The new organic sulfides emissions level determined by the compliance stack test shall, beginning ten (10) business days after OAQ receives the test report for the compliance stack test, be used by the Permittee to calculate compliance with the VOC emissions limit in Condition K.2.1(a)(2).

(d) The Permittee shall perform VOC testing for L BOILER utilizing methods as approved by the Commissioner. Testing shall be conducted in accordance with Section C- Performance Testing, and shall be conducted within ninety (90) days upon VOC coating application of Line Coating 16. This test shall be repeated at least once every five (5) years from the date of this compliance demonstration.

(e) 1) No later than June 30, 2009, in order to demonstrate compliance with Condition K.2.4, the Permittee shall perform PM testing for R BOILER utilizing methods as approved by the Commissioner. This test shall be repeated at least once every five (5) years from the date of this valid compliance demonstration. Testing shall be conducted in accordance with Section C- Performance Testing.

2) If the Permittee chooses to control emissions from the COS stream or SHEETFUMES using the BW-Boiler, PM testing shall be performed for BW-Boiler utilizing methods as approved by the Commissioner. Testing shall be conducted within ninety (90) days of beginning to use the BW-Boiler for control of either the COS stream or SHEETFUMES. Testing shall be repeated at least once every five (5) years from the date of the most recent compliance demonstration.

(f) The Permittee shall perform VOC testing for BW-BOILER utilizing methods as approved by the Commissioner. Testing shall be conducted in accordance with Section C- Performance Testing, and shall be conducted within ninety (90) days of initial routing of

the SHEETFUMES to BW-Boiler. This test shall be repeated at least once every five (5) years from the date of this compliance demonstration.

(g) No later than April 25, 2012 for L Boiler and June 12, 2012 for E Boiler, in order to demonstrate compliance with Condition K.2.4, the Permittee shall perform PM testing for E BOILER and L BOILER utilizing methods as approved by the Commissioner. The Permittee shall document the baghouse bypass damper position during the performance test. This test shall be repeated at least once every five (5) years from the date of this valid compliance demonstration. Testing shall be conducted in accordance with Section C- Performance Testing.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)][326 IAC 2-7-5(1)]

K.2.13 Volatile Organic Compounds (VOC) and Sulfur Dioxide (SO_2) from the COS stream

(a) Whenever the COS stream is being vented to E BOILER or L BOILER to destroy organic sulfides:

(1) Such boiler(s) shall operate at minimum steam production rates of 154,000 pounds per hour and 55,000 pounds per hour, respectively; and

(2) The Permittee shall monitor and record the steam production rate(s) of such boiler(s). Steam production rates shall be measured as block averages with the blocks to begin at midnight, 0300, 0600, 0900, 1200, 1500, 1800, and 2100 hours, and with each average to consist of at least ten measurements made during each block of time. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the steam production limits are outside the established range in K.2.13(a)(1), the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition K.2.1 of this permit.

(b) Whenever the COS stream is being vented to R BOILER and BW-BOILER to destroy organic sulfides, the R BOILER and BW-BOILER shall each operate at a minimum steam production rate needed to ensure that the organic sulfides emissions will not exceed 10.7 pounds per hour, or the rate determined in the most recent stack test conducted as required by Condition K.2.12(a), when the COS stream is vented to these boilers for destruction. The minimum steam production rates shall be determined during the stack test required by Condition K.2.12(b).

(c) Whenever the COS stream is being vented to the COS Vent Oxidizer or the COS Flare to destroy organic sulfides, Condition I.2.5 applies.

K.2.14 Volatile Organic Compounds (VOC) from C-41 and C-42 SHEETFUMES

Whenever the C-41 and C-42 coating lines, described in Section L of this permit, are operating using VOC based coating and VOC emissions are vented to one or more of the E BOILER, R BOILER, and BW-Boiler, for control of VOC:

(a) Such boiler(s) shall each operate at a minimum combustion zone temperature of 1400°F, calculated as a rolling 3-hour average, or the temperatures established during the most recent stack test; and

(b) The Permittee shall monitor and record the combustion zone temperature of such boiler(s) at least once each hour. When for any three (3) hour average reading (arithmetic

average of three contiguous one-hour periods), the temperature is below 1400°F or the temperatures established during the most recent stack test, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition K.2.2 and L.2.1(a) of this permit.

K.2.15 [RESERVED]

K.2.16 Continuous Opacity Monitoring [326 IAC 3-5]

Pursuant to CP 129-5500-00002, Condition 11, as amended by Administrative Amendment A129-10164-00002 issued on January 22, 1999 a continuous monitoring system, which meets the performance specifications of 326 IAC 3-5-2, shall be calibrated, maintained, and operated for measuring opacity of the combined stack emissions from the E BOILER, L BOILER, and V BOILER, except for continuous monitoring system breakdowns and repairs. Data is recorded during calibration checks and zero and span adjustments.

K.2.17 COM Opacity Readings [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

(a) In the event of a continuous opacity monitor (COM) opacity exceeding thirty-five percent (35%) average opacity for three (3) consecutive six (6) minute averaging periods, reasonable response steps shall be taken in accordance with Section C - Response to Excursions or Exceedances such that the cause(s) of the excursion are identified and corrected and opacity levels are brought back below thirty-five percent (35%).

(b) COM opacity readings in excess of thirty-five percent (35%) but not exceeding the opacity limit for the unit are not a deviation from this permit. Failure to take response steps in accordance with Section C -Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(c) The Permittee may request that the IDEM, OAQ approve a different opacity trigger level than the one specified in K.2.17(a) and (b), provided the Permittee can demonstrate, through stack testing or other appropriate means, that a different opacity trigger level is appropriate for monitoring compliance with the applicable particulate matter mass emission limits.

K.2.18 Method 9 Opacity Readings

(a) Whenever a COM is malfunctioning, the Permittee shall follow the procedures in accordance with Section C - Maintenance of Continuous Opacity Monitoring Equipment, until such time that the continuous opacity monitor is back in operation.

(b) Whenever a COM is malfunctioning, reasonable response steps shall be taken in accordance with Section C - Response to Excursions or Exceedances whenever the opacity from E BOILER, L BOILER, and V BOILER, measured by Method 9, exceeds thirty-five percent (35%) for any three (3) consecutive six (6) minute average periods. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

K.2.19 Visible Emissions Notations

(a) Visible emission notations of the R BOILER and BW-BOILER stack exhaust shall be performed once per day during normal daylight operations when the boilers burn COS. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from R BOILER and BW-BOILER, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

K.2.20 Baghouse Parametric Monitoring [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

(a) The Permittee shall record the pressure drop across each baghouse used in conjunction with E BOILER, L BOILER, and V BOILER at least once per day when these boilers are in operation and the baghouse is used to control emissions from such boilers. When for any one reading, the pressure drop across the baghouse is outside the normal range of 1.0 and 12.0 inches of water or a range established based upon stack test data, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

(b) The instrument used for determining the pressure shall comply with Section C - Instrument Specifications, and shall be calibrated in accordance with the manufacturer's specifications. The specifications shall be available on site.

(c) The Permittee shall record the position of the baghouse bypass damper used in conjunction with E BOILER, L BOILER, and V BOILER baghouse at least once per day when any of these boilers is in operation. A reading is not required if the Permittee welds the damper in the closed position or a car-seal is used, the damper position remains unchanged and is verified at the time the weld or car-seal is applied.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

K.2.21 Record Keeping Requirements

(a) To document compliance with Condition K.2.1(a) and K.2.7, the Permittee shall maintain the following records:

(1) The total daily sulfur input, and the 365-day rolling total of total daily sulfur input, to the E BOILER, L BOILER, and V BOILER and carbon monoxide generators.

(2) The weight of VOCs emitted each day and the 365-day rolling total of the weight of VOCs emitted from the emission units V-723 and V-519, and the COS stream (involved in the 1995 or 1996 resin expansion project), considering capture and destruction (or removal) efficiency. This record should include the weight of organic sulfides emitted each day from each type of control device (boilers; oxidizer; flare), calculated pursuant to Condition K.2.7(c).

(3) Daily analyses of sulfur content of coal used by the Lasker, Erie, and Vogt boilers.

(4) Identity of each type of control device (boilers or, oxidizer or flare as described in Section I) to which the COS stream is vented for Organic Sulfide control and the

amount of time during a calendar day that the type of control device is in use; except failure to maintain such records and calculating compliance pursuant to Condition K.2.7(c)(3) shall not be a deviation from this requirement.

(5) Three-hour block average steam production rates for L BOILER and E BOILER during periods when the COS stream is vented to these boilers for organic sulfide control.

(b) The Permittee shall maintain records of the instantaneous, integrated total steam loadings of the E BOILER, L BOILER, and V BOILER to document compliance with Condition K.2.1(b).

(c) In order to document compliance with Conditions K.2.2 and K.2.8, the Permittee shall maintain, at least hourly, records of the combustion zone temperatures of any of the four (4) boilers, BW-BOILER, E BOILER, L BOILER, and R BOILER that are being used to control VOC emissions (SHEETFUMES) from C-41 and C-42.

(d) To document compliance with the SO_2 provisions in Conditions K.2.5 and K.2.11, the Permittee shall maintain records in accordance with (1) and (2) below.

(1) All fuel sampling and analysis data, pursuant to 326 IAC 7-2, and data collected in accordance with Condition K.2.11.

(2) Actual fuel usage since last compliance determination period.

(e) To document compliance with K.2.5(b), the Permittee shall use methods specified in 326 IAC 3-7-5(a) and develop a standard operating procedure (SOP) for E BOILER, L BOILER, and V BOILER to be followed for sampling, handling, analysis, quality control, quality assurance, and data reporting of the information collected pursuant to Condition K.2.11(b). In addition any revision to the SOP shall be submitted to IDEM, OAQ.

(f) To document compliance with Conditions K.2.16 and K.2.17, the Permittee shall maintain records of the continuous opacity monitoring (COM) data specified in 326 IAC 3-5-6. Records shall be sufficient to establish compliance with the limits established in this section. When the COM system is not functioning, the Permittee shall maintain records of opacity readings of the stack exhaust conducted in accordance with Section C - Maintenance of Continuous Opacity Monitoring Equipment in order to document compliance with Condition K.2.16.

(g) To document compliance with Condition K.2.19, the Permittee shall maintain the daily record of the visible emission notations of the stack exhaust required by Condition K.2.19(a). When a daily record of normal or abnormal is not recorded, the Permittee shall maintain records of the reason(s) for the lack of a visible emission notation (e.g. the process did not operate that day or did not burn either oil or COS that day).

(h) To document compliance with Condition K.2.20, the Permittee shall maintain the records recorded once per day of the position of the baghouse bypass damper and of the pressure drop across the baghouse used in conjunction with E BOILER, L BOILER, and V BOILER during normal operation. Daily records of the baghouse bypass damper position are not required on days for which the Permittee maintains the damper in the closed position by using a car-seal or by welding, provided that the Permittee has previously documented the damper position at the time the car-seal or weld is applied.

(i) All records required to be maintained by Condition K.2.21 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

K.2.22 Reporting Requirements

(a) A quarterly summary of the information to document compliance with Condition K.2.1(a)(2) shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(b) To document compliance with Condition K.2.1(b), a quarterly report of any one-hour periods where the combined steam loadings of E BOILER, L BOILER, or V BOILER exceeded 325,000 pounds per hour shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the deviation reporting forms located at the end of Section C of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(c) A quarterly report of opacity exceedances shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. A report containing the information specified in 326 IAC 3-5-7 may be used to fulfill this requirement. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(d) A quarterly report of the calendar month average coal sulfur content, coal heat content, and sulfur dioxide emission rate in pounds per million Btus for E BOILER, L BOILER, and V BOILER and the total monthly coal consumption shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of Section K of the permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. [326 IAC 7-2-1(c)(2)]

The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(e) The natural gas boiler certification shall be used for BW BOILER. This certificate provides documentation of each time interval when the boiler is burning natural gas and visual emissions notations are not necessary for BW BOILER. The natural gas boiler certification shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting form located at the end of this permit, or its equivalent, within thirty (30) days after the end of the six (6) month period being reported. The natural gas-fired boiler certification does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

(f) In order to document compliance with Condition K.2.16, reports shall be prepared as specified in 326 IAC 3-5-7(5). Reporting of continuous monitoring system instrument downtime, except for zero (0) and span checks, which shall be reported separately, shall include the following:

(1) Date of downtime.
(2) Time of commencement.
(3) Duration of each downtime.
(4) Reasons for each downtime.
(5) Nature of system repairs and adjustments.

The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(g) The Permittee shall submit the reports and records required by Condition K.2.22 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION K.3 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Boilerhouse I

BH I Storage and Heat Exchange Operations

(c) The storage and heat exchange operations located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-003	NO.6 ST TK	NO.6 FUEL OIL STORAGE TANK	None	None	1,514 m^3	N/A
09-004	GSTA	UNLEADED GASOLINE STORAGE TANK VH-1	None	None	3.81 m^3	N/A
09-005	GST(L)	DIESEL-R STORAGE TANK VH-2	None	None	2.18 m^3	N/A
09-009	DST	DIESEL STORAGE TANK VH-3	None	None	2.13 m^3	N/A
09-100	F-CVCS-BH1	CENTRAL VACUUM SYSTEM	None	None	0.175 tons/hour	N/A
09-101	BH1 CTC1	COOLING TOWER #1 CELL A	None	None	N/A	N/A
09-102	BH1 CTC2	COOLING TOWER #1 CELL B	None	None	N/A	N/A
09-103	BH1 CTC3	COOLING TOWER #1 CELL C	None	None	N/A	N/A
09-104	BH1 CTC4	COOLING TOWER #1 CELL D	None	None	N/A	N/A
09-105	BH1 CTC5	COOLING TOWER #1 CELL E	None	None	N/A	N/A
09-107	PRV-TS	PRV TEST STAND	None	None	N/A	N/A
09-111	MG CTC3	COOLING TOWER CELL 3	None	None	N/A	N/A
09-112	GST VH4	UNLEADED GASOLINE TANK VH4	None	None	2.13 m^3	N/A
09-113	DST VH5	DIESEL STORAGE TANK VH5	None	None	2.13 m^3	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

K.3.1 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission unit F-CVCS-BH1 shall not exceed the rates calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for this emission unit and the allowable rate of emission calculated for the process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	Max Process Weight Rate (tons/hr)	Rate of Emission (lb/hr)
09-100	F-CVCS-BH1	0.175	1.28

K.3.2 Motor Vehicle Tampering, Engine Switching, and Fuel Switching [326 IAC 13-2.1-3]

Pursuant to 326 IAC 13-2.1-3(c), the Permittee shall not engage in fuel switching. This condition is not federally enforceable.

Section K consists of the following Sections: K.1, K.2, K.3, one (1) Part 70 Usage Reporting Form, three (3) Part 70 Quarterly Reporting Forms, and one (1) Part 70 Semi-Annual Natural Gas Fired Boiler Certification form.

Condition K.3.2 concludes the Section K requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section
Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Conditions G.2.1(a), I.2.1(b), and K.2.1(a)(2)
Facility: V-723, V-519, COS Stream
Parameter: VOC
Limit: 55 tons per 365-day period, rolled on a daily basis.

Year: _____Month: _____

Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365-day period	Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365-day period
1			17		
2			18		
3			19		
4			20		
5			21		
6			22		
7			23		
8			24		
9			25		
10			26		
11			27		
12			28		
13			29		
14			30		
15			31		
16			No. of deviations		

☐ No deviation occurred in this month.

☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition K.2.5(b)
Facility: Vent 09-002, E BOILER
Parameter: SO_2
Limits: 6.0 lbs SO_2 per million Btu heat input

Year: _____ Quarter: _____

Month	Coal Sulfur Content (%)	Coal Heat Content (Btu/lb)	Coal usage (tons/month)	SO_2 Emissions (lb/MMBTU)

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition K.2.5(b)
Facility: Vent 09-002, L BOILER
Parameter: SO_2
Limits: 6.0 lbs SO_2 per million Btu heat input

Year:_____ Quarter: _____

Month	Coal Sulfur Content (%)	Coal Heat Content (Btu/lb)	Coal usage (tons/month)	SO_2 Emissions (lb/MMBTU)

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: One Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002 Condition K.2.5(b)
Facility: Vent 09-002, V BOILER
Parameter: SO_2
Limits: 6.0 lbs SO_2 per million Btu heat input

Year: _____ Quarter: _____

Month	Coal Sulfur Content (%)	Coal Heat Content (Btu/lb)	Coal usage (tons/month)	SO_2 Emissions (lb/MMBTU)

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

PART 70 OPERATING PERMIT
SEMI-ANNUAL NATURAL GAS FIRED BOILER CERTIFICATION

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: BW-BOILER

☐ Natural Gas Only

☐ Alternate Fuel burned
From: _____ To: _____

Submitted by:
Signature:
Printed Name:
Title/Position:
Phone:
Date:

Attach a certification by the responsible official as defined by 326 IAC 2-7-1(34) to complete this report.

SECTION L.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Structured Products, Building 4

Structured Products Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the entire affected source subject to the applicable regulation.

(a) Sp-PPPC is the affected source pursuant to 40 CFR 63, Subpart PPPP - National Emission Standards for Hazardous Air Pollutants: Surface Coating of Plastic Parts and Products. In accordance with 40 CFR 63, Subpart PPPP, the following emissions units comprise the affected source, identified as Sp-PPPC, that is subject to 40 CFR 63, Subpart PPPP:

(1) All coating operations as defined in 40 CFR 63.4581 (plastic coating lines identified in Section L.2 of this permit as C-41 and C-42 are included in this affected source);
(2) All storage containers and mixing vessels in which coatings, thinners and/or other additives, and cleaning materials are stored or mixed;
(3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and
(4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation.

(b) Sp-POWC is the affected source pursuant to 40 CFR 63, Subpart JJJJ – National Emission Standards for Hazardous Air Pollutants: Paper and Other Web Coating. The affected source, identified as Sp-POWC, comprises all web coating lines, as set forth in 40 CFR 63.3300. Web, as defined in 40 CFR 63.3310 means a continuous substrate which is flexible enough to be wound or unwound as rolls. Web coating lines identified in Section L.2 of this permit as S-4, S-5, and C-6, and film coating lines identified as C-45, C7A, C7B, and C8 are included in this affected source.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

L.1.1 General Provisions Relating to HAPs [326 IAC 20-1][40 CFR Part 63, Subpart A] [Table 2 to 40 CFR Part 63, Subpart PPPP] [40 CFR 63.4501]

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as otherwise specified by Table 2 to 40 CFR Part 63, Subpart PPPP.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.6(e)(1)	Compliance with standards and maintenance requirements
63.6(f)(2-3)	Compliance with standards and maintenance requirements
63.8(b)	Monitoring requirements

L.1.2 National Emission Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products [326 IAC 20-81] [40 CFR Part 63, Subpart PPPP] [40 CFR 63.4481] [40 CFR 63.4482] [40 CFR 63.4483(b)] [40 CFR 63.4581]

(a) The provisions of 40 CFR Part 63, Subpart PPPP (National Emission Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products) apply to the affected source, identified as Sp-PPPC. Pursuant to 40 CFR 63.4483(b), the Permittee must comply with these requirements on and after April 19, 2007, or such other compliance date authorized pursuant to 40 CFR 63.6. The following table provides specific requirements of 40 CFR 63, Subpart PPPP that apply to the affected source Sp-PPPC:

Applicable 40 CFR Part 63, Subpart PPPP Requirement	Regulatory Citation Description
63.4481(a)	Applicability Standards
63.4481(b)	Applicability Standards
63.4481(c)	Applicability Standards
63.4481(e)(1)	Applicability Standards
63.4482(a)	Applicability Standards
63.4482(b)	Affected Source
63.4482(e)	Affected Source
63.4483(b)	Compliance Date Requirements
63.4483(d)	Compliance Date Requirements
63.4580	Implementation and Enforcement of Subpart
63.4581	Definitions

(b) [RESERVED]

(c) In accordance with 40 CFR 63, Subpart PPPP, the following emissions units comprise the affected source, identified as Sp-PPPC, that is subject to 40 CFR 63, Subpart PPPP:

(1) All coating operations as defined in 40 CFR 63.4581;
(2) All storage containers and mixing vessels in which coatings, thinners and/or other additives, and cleaning materials are stored or mixed;
(3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and
(4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation.

(d) Terminology used in requirements established in this permit pursuant to 40 CFR 63, Subpart PPPP are defined in the CAA, in 40 CFR 63.2, and in 40 CFR 63.4581, and are applicable to the affected source Sp-PPPC.

L.1.3 General Provisions Relating to HAPs [326 IAC 20-1][40 CFR Part 63, Subpart A]

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-POWC, except as provided in Table 2 of 40 CFR 63, Subpart JJJJ.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.6(e)	Compliance with standards and maintenance requirements
63.6(f)	Compliance with standards and maintenance requirements
63.8(b)	Monitoring requirements

Compliance Determination Requirements

L.1.4 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The table that follows provides performance testing requirements of 40 CFR PART 63, Subpart A, General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-POWC, except as provided in Table 2 of 40 CFR 63, Subpart JJJJ.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.7(a)(2)	Performance testing requirements
63.7(a)(3)	Performance testing requirements
63.7(f)	Performance testing requirements - Use of an alternative test method
63.7(h)	Performance testing requirements - waiver of performance test

L.1.5 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The following table provides performance testing requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as provided in Table 2 of 40 CFR 63, Subpart PPPP:

Applicable 40 CFR Part 63, Subpart A Requirements	Regulatory Citation Description
63.7(a)(3)	Administrator may require performance testing

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

L.1.6 Notification Requirements for Sp-PPPC [40 CFR 63.4510]

To comply with Condition L.1.2, the Permittee shall submit all of the notifications described in 40 CFR 63.4510, Subpart PPPP that apply to the affected source by the dates specified. These notifications include, but are not limited to, the following:

(a) General. The Permittee must submit the notifications in 40 CFR 63.7(b) and (c), 63.8(f)(4), and 63.9(b) through (e) and (h) that apply to the affected source Sp-PPPC by the dates specified in those sections, except as provided in 40 CFR 63.4510(b) and (c). The initial notification required by 40 CFR 63.4510(b) was submitted by the Permittee on April 5, 2005.

(b) Notification of compliance status. The Permittee must submit the notification of compliance status required by 40 CFR 63.9(h) no later than 30 calendar days following the end of the initial compliance period described in 40 CFR 63.4540, 40 CFR 63.4550, or 40 CFR 63.4560 that applies to the affected source Sp-PPPC. The notification of compliance status must contain the information specified in 40 CFR 63.4510(c), paragraphs (1) through (11) and in 40 CFR 63.9(h).

L.1.7 Reporting Requirements

The notifications required by Condition L.1.6 shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The notifications required by L.1.6 require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

L.1.8 Record Keeping and Reporting Requirements for Sp-PPPC

(a) The table that follows provides the record keeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as provided in Table 2 to 40 CFR 63, Subpart PPPP.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements
63.9(b)	Notification requirements
63.9(h)	Notification requirements - Notification of compliance status
63.10(a)	Recordkeeping and reporting requirements - Applicability and general information
63.10(b)(1)	Recordkeeping and reporting requirements - General recordkeeping requirements
63.10(b)(3)	Recordkeeping and reporting requirements - General recordkeeping requirements
63.10(d)(1)	Recordkeeping and reporting requirements - General reporting requirements
63.12(c)	State authority and delegations
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) All records required to be maintained by Condition L.1.8 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit reports and records required to be submitted by Condition L.1.8 to the address listed in Section C - General Reporting Requirements, of this permit.

L.1.9 Record Keeping and Reporting Requirements for Sp-POWC

(a) The table that follows provides the record keeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-POWC, except as provided in Table 2 to 40 CFR 63, Subpart JJJJ.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements
63.9(b)	Notification requirements
63.9(h)	Notification requirements - Notification of compliance status
63.10(a)	Recordkeeping and reporting requirements - Applicability and general information
63.10(b)	Recordkeeping and reporting requirements - General recordkeeping requirements
63.10(d)	Recordkeeping and reporting requirements - General reporting requirements
63.12(c)	State authority and delegations
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) All records required to be maintained by Condition L.1.9 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit reports and records required to be submitted by Condition L.1.9 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION L.2 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Structured Products, Building 4

Structured Products Operations

(c) The Structured Products operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001; 09-002; and 09-106	SHEETFUMES*	COATING LINES - C-41, C-42, S-4, S-5	Boilers in Section K	None	N/A	N/A
10-086	OSFCA	C-45 FILM COATER	None	None	N/A	N/A
10-087	OSFCB		None	None	N/A	N/A
10-199	C42FMR	C-42 FMR COOLING ZONE	None	None	N/A	N/A
10-358	C7A	C7A PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-359	C7B	C7B PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-360	C8	C8 PLASTIC FILM WEB COATING LINE	None	None	N/A	2006
10-361	C-6	C-6 COATING LINE	None	None	N/A	N/A

Insignificant Activities[d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
10-010	EDV S5	EXTRUDER & DIE VENT S-5	None	None	1.70 tons/hour	N/A
10-011	EHV S4	EXTRUDER & DIE VENT S-4	None	None	1.23 tons/hour	N/A
10-012	EHV S3	EXTRUDER HEATER VENT S-3	None	None	0.33 tons/hour	N/A
10-013	EHV S1	EXTRUDER HEATER VENT S-1	None	None	0.20 tons/hour	N/A
10-014	PDH86	PELLET DRYING HOPPER 86	None	None	1.60 tons/hour	N/A
10-015	PDH85	PELLET DRYING HOPPER 85	None	None	1.60 tons/hour	N/A
10-016	PDH84	PELLET DRYING HOPPER 84	None	None	1.60 tons/hour	N/A
10-017	PDH83	PELLET DRYING HOPPER 83	None	None	1.60 tons/hour	N/A
10-018	PDH82	PELLET DRYING HOPPER 82	None	None	1.60 tons/hour	N/A
10-019	PDH81	PELLET DRYING HOPPER 81	None	None	1.60 tons/hour	N/A
10-020	PDH76	PELLET DRYING HOPPER 76	None	None	1.23 tons/hour	N/A
10-021	PDH75	PELLET DRYING HOPPER 75	None	None	1.23 tons/hour	N/A
10-022	PDH74	PELLET DRYING HOPPER 74	None	None	1.23 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-023	PDH73	PELLET DRYING HOPPER 73	None	None	1.23 tons/hour	N/A
10-024	PDH72	PELLET DRYING HOPPER 72	None	None	1.23 tons/hour	N/A
10-025	PDH71	PELLET DRYING HOPPER 71	None	None	1.23 tons/hour	N/A
10-026	PDH43	PELLET DRYING HOPPER 43	None	None	1.23 tons/hour	N/A
10-027	PDH45	PELLET DRYING HOPPER 45	None	None	1.23 tons/hour	N/A
10-028	PDH44	PELLET DRYING HOPPER 44	None	None	1.23 tons/hour	N/A
10-029	PDH42	PELLET DRYING HOPPER 42	None	None	1.23 tons/hour	N/A
10-030	PDH46	PELLET DRYING HOPPER 46	None	None	1.23 tons/hour	N/A
10-031	PDH41	PELLET DRYING HOPPER 41	None	None	1.23 tons/hour	N/A
10-032	PDH53	PELLET DRYING HOPPER 53	None	None	1.70 tons/hour	N/A
10-033	PDH51	PELLET DRYING HOPPER 51	None	None	1.70 tons/hour	N/A
10-034	PDH52	PELLET DRYING HOPPER 52	None	None	1.70 tons/hour	N/A
10-035	PDH37	PELLET DRYING HOPPER 37	None	None	0.33 tons/hour	N/A
10-036	PDH35	PELLET DRYING HOPPER 35	None	None	0.33 tons/hour	N/A
10-037	PDH36	PELLET DRYING HOPPER 36	None	None	0.33 tons/hour	N/A
10-038	PDH34	PELLET DRYING HOPPER 34	None	None	0.33 tons/hour	N/A
10-039	PDH31	PELLET DRYING HOPPER 31	None	None	0.33 tons/hour	N/A
10-040	PDH33	PELLET DRYING HOPPER 33	None	None	0.33 tons/hour	N/A
10-041	PDH32	PELLET DRYING HOPPER 32	None	None	0.33 tons/hour	N/A
10-042	PDH14	PELLET DRYING HOPPER 14	None	None	0.33 tons/hour	N/A
10-043	PDH13	PELLET DRYING HOPPER 13	None	None	0.55 tons/hour	N/A
10-044	PDH12	PELLET DRYING HOPPER 12	None	None	0.55 tons/hour	N/A
10-045	PDH11	PELLET DRYING HOPPER 11	None	None	0.55 tons/hour	N/A
10-046	PDH65	PELLET DRYING HOPPER 65	None	None	0.55 tons/hour	N/A
10-047	PDH64	PELLET DRYING HOPPER 64	None	None	0.55 tons/hour	N/A
10-048	PDH63	PELLET DRYING HOPPER 63	None	None	0.55 tons/hour	N/A
10-049	DHE (S8)	DIE HEAD EXHAUST S-8/S-1	None	None	1.60 tons/hour	N/A
10-054	EDHE (S6)	EXTRUDER & DIE HEAD EXHAUST S-6	None	None	0.55 tons/hour	N/A
10-055	DHE (S10)	DIE HEAD EXHAUST S10	None	None	0.55 tons/hour	N/A
10-055	DHE (S2)	DIE HEAD EXHAUST S-2	None	None	0.20 tons/hour	N/A
10-056	PDH62	PELLET DRYING HOPPER 62	None	None	0.55 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-057	PDH61	PELLET DRYING HOPPER 61	None	None	0.55 tons/hour	N/A
10-077	PED	PROFILE EXTRUDER & DIE	None	None	0.50 tons/hour	N/A
10-078	PDH161	PROFILE PELLET DRYING HOPPER 161	None	None	0.50 tons/hour	N/A
10-079	PDH162	PROFILE PELLET DRYING HOPPER 162	None	None	0.50 tons/hour	N/A
10-080	PDH163	PROFILE PELLET DRYING HOPPER 163	None	None	0.50 tons/hour	N/A
10-081	PDH164	PROFILE PELLET DRYING HOPPER 164	None	None	0.50 tons/hour	N/A
10-082	PDH165	PROFILE PELLET DRYING HOPPER 165	None	None	0.50 tons/hour	N/A
10-083	PDH166	PROFILE PELLET DRYING HOPPER 166	None	None	0.50 tons/hour	N/A
10-097	CAVP-097	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-098	CAVP-098	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-099	QCSB	QC SPRAY BOOTH	None	None	Less Than 100 lb/hr	N/A
10-100	QABH	QA BURN HOOD	None	None	Less Than 100 lb/hr	N/A
10-101	QA01	QC OVEN 1	None	None	N/A	N/A
10-105	DCE	DIE CLEAN EXHAUST	None	None	N/A	N/A
10-106	S1 BLOWER	SCALE 1 BLOWER	None	Filter	5.43 tons/hour	N/A
10-107	S2 BLOWER	SCALE 2 BLOWER	None	Filter	5.43 tons/hour	N/A
10-108	S3 BLOWER	SCALE 3 BLOWER	None	Filter	5.43 tons/hour	N/A
10-112	PDH51N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-113	PDH52N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-114	PDH53N	PELLET DRYER HOPPER	None	None	0.10 tons/hour	N/A
10-115	CAVP-115	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-116	CAVP-116	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-117	CAVP-117	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-118	CAVP-118	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-120	PDH131	PELLET DRYING HOPPER 131	None	None	0.78 tons/hour	N/A
10-121	PDH132	PELLET DRYING HOPPER 132	None	None	0.78 tons/hour	N/A
10-122	PDH133	PELLET DRYING HOPPER 133	None	None	0.78 tons/hour	N/A
10-123	PDH134	PELLET DRYING HOPPER 134	None	None	0.78 tons/hour	N/A
10-124	PDH135	PELLET DRYING HOPPER 135	None	None	0.78 tons/hour	N/A
10-125	CAVP-125	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-126	CAVP-126	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-127	T13ED	EXTRUDER/DIE EXHAUST	None	None	0.46 tons/hour	N/A
10-128	CAVP-128	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-129	CAVP-129	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-130	CAVP-130	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-131	CAVP-131	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-134	PDH1413	PELLET DRYING HOPPER 1413	None	None	1.23 tons/hour	N/A
10-135	PDH1414	PELLET DRYING HOPPER 1414	None	None	1.23 tons/hour	N/A
10-136	PDH1411	PELLET DRYING HOPPER 1411	None	None	1.23 tons/hour	N/A
10-136	PDH1421	PELLET DRYING HOPPER 1421	None	None	1.23 tons/hour	N/A
10-136	PDH1431	PELLET DRYING HOPPER 1431	None	None	1.23 tons/hour	N/A
10-137	PDH1412	PELLET DRYING HOPPER 1412	None	None	1.23 tons/hour	N/A
10-137	PDH1432	PELLET DRYING HOPPER 1432	None	None	1.23 tons/hour	N/A
10-138	PDH1441	PELLET DRYING HOPPER 1441	None	None	1.23 tons/hour	N/A
10-138	PDH1451	PELLET DRYING HOPPER 1451	None	None	1.23 tons/hour	N/A
10-138	PDH1461	PELLET DRYING HOPPER 1461	None	None	1.23 tons/hour	N/A
10-139	PDH1442	PELLET DRYING HOPPER 1442	None	None	1.23 tons/hour	N/A
10-139	PDH1452	PELLET DRYING HOPPER 1452	None	None	1.23 tons/hour	N/A
10-139	PDH1462	PELLET DRYING HOPPER 1462	None	None	1.23 tons/hour	N/A
10-146	F14ED	F14 EXTRUDER & DIE	None	None	1.23 tons/hour	N/A
10-147	GS8-BH	GRINDER TRANSFER BLOWER	None	Filter	0.12 tons/hour	N/A
10-148	G2	GRINDER 2	None	None	0.12 tons/hour	N/A
10-149	G1	GRINDER	None	None	0.06 tons/hour	N/A
10-150	G3	GRINDER 3	None	None	0.12 tons/hour	N/A
10-150	G4	GRINDER 4	None	None	0.12 tons/hour	N/A
10-152	F12ED	F12 EXTRUDER & DIE	None	None	0.70 tons/hour	N/A
10-153	PDH121	PELLET DRYING HOPPER 121	None	None	0.70 tons/hour	N/A
10-154	PDH122	PELLET DRYING HOPPER 122	None	None	0.70 tons/hour	N/A
10-155	PDH123	PELLET DRYING HOPPER 123	None	None	0.70 tons/hour	N/A
10-156	PDH124	PELLET DRYING HOPPER 124	None	None	0.70 tons/hour	N/A
10-157	CAVP-157	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-158	CAVP-158	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-159	PDH111	PELLET DRYING HOPPER 111	None	None	0.55 tons/hour	N/A
10-160	PDH112	PELLET DRYING HOPPER 112	None	None	0.55 tons/hour	N/A
10-161	CAVP-161	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-162	TC (A)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-168	TC(B)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-171	AIR ELIM A	RECOVERY DEVICE	None	None	Less Than 100 lb/hr	N/A
10-172	AIR ELIM B	RECOVERY DEVICE	None	None	Less Than 100 lb/hr	N/A
10-178	KE	R&D SPRAY BOOTH - HWR	None	None	Less Than 100 lb/hr	N/A
10-179	R&D CCRC	R&D COLD CAST ROLL COATER, UV CURE AND EXTRUDER	None	None	Less Than 100 lb/hr	N/A
10-180	RRC&C	REVERSE ROLL COATER & CURE	None	None	1.60 tons/hour	N/A
10-181	SILO 1 BV	BAGHOUSE SILO 1	None	Filter	5.43 tons/hour	N/A
10-182	SILO 2 BV	BAGHOUSE SILO 2	None	Filter	5.43 tons/hour	N/A
10-183	SILO 3 BV	BAGHOUSE SILO 3	None	Filter	5.43 tons/hour	N/A
10-184	LPS BLOWER	LPS BIN VENT BLOWER	None	None	0.50 tons/hour	N/A
10-185	F14 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.23 tons/hour	N/A
10-186	S4 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.20 tons/hour	N/A
10-187	S5 BV	BAGHOUSE RECOVERY DEVICE	None	Filter	1.75 tons/hour	N/A
10-189	DHE UCFL	DIE HOOD EXHAUST - ULTEM# CAST FILM LINE	None	None	0.20 tons/hour	N/A
10-191	PDH 1701	PELLET DRYING HOPPER 1701	None	None	0.20 tons/hour	N/A
10-192	PDH 1702	PELLET DRYING HOPPER 1702	None	None	0.20 tons/hour	N/A
10-193	PDH1703	PELLET DRYING HOPPER 1703	None	None	0.20 tons/hour	N/A
10-194	PDH1704	PELLET DRYING HOPPER 1704	None	None	0.20 tons/hour	N/A
10-195	CAVP-195	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-196	CAVP-196	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-200	FLH	FINISHING LAB HOOD	None	None	N/A	N/A
10-202	HWL-KL51	R&D HOOD WET LAB	None	None	N/A	N/A
10-203	HWL-KL52	R&D HOOD WET LAB	None	None	N/A	N/A
10-204	HWL-LM51	R&D HOOD WET LAB	None	None	N/A	N/A
10-205	HWL-LM52	R&D HOOD WET LAB	None	None	N/A	N/A
10-206	OWL-L3	R&D OVEN WET LAB	None	None	N/A	N/A
10-207	OWL-LM31	R&D OVEN WET LAB	None	None	N/A	N/A
10-208	OWL-LM32	R&D OVEN WET LAB	None	None	N/A	N/A
10-300	PDH113	PELLET DRYING HOPPER 113	None	None	0.55 tons/hour	N/A
10-301	PDH114	PELLET DRYING HOPPER 114	None	None	0.55 tons/hour	N/A
10-302	PDH91	PELLET DRYING HOPPER 91	None	None	0.55 tons/hour	N/A
10-302	PDH92	PELLET DRYING HOPPER 92	None	None	0.55 tons/hour	N/A
10-303	PDH93	PELLET DRYING HOPPER 93	None	None	0.55 tons/hour	N/A
10-303	PDH94	PELLET DRYING HOPPER 94	None	None	0.55 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-304	PDH20	PELLET DRYING HOPPER 20	None	None	0.20 tons/hour	N/A
10-304	PDH21	PELLET DRYING HOPPER 21	None	None	0.20 tons/hour	N/A
10-304	PDH22	PELLET DRYING HOPPER 22	None	None	0.20 tons/hour	N/A
10-304	PDH23	PELLET DRYING HOPPER 23	None	None	0.20 tons/hour	N/A
10-305	PDH101	PELLET DRYING HOPPER 101	None	None	0.55 tons/hour	N/A
10-305	PDH104	PELLET DRYING HOPPER 104	None	None	0.55 tons/hour	N/A
10-306	PDH102	PELLET DRYING HOPPER 102	None	None	0.55 tons/hour	N/A
10-306	PDH103	PELLET DRYING HOPPER 103	None	None	0.55 tons/hour	N/A
10-307	PDH 54N	PELLET DRYING HOPPER 54 NEW	None	None	1.70 tons/hour	N/A
10-308	PDH55N	PELLET DRYING HOPPER 55 NEW	None	None	1.70 tons/hour	N/A
10-309	PDH56N	PELLET DRYING HOPPER 56 NEW	None	None	1.70 tons/hour	N/A
10-310	CAVP-310	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-311	CAVP-311	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-312	CAVP-312	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-313	CAVP-313	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-314	CAVP-314	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-315	CAVP-315	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-316	CAVP-316	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-317	CAVP-317	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-318	CAVP-318	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-319	CAVP-319	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-320	CAVP-320	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-321	CAVP-321	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-322	CAVP-322	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-323	CAVP-323	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-324	CAVP-324	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-325	CAVP-325	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-326	CAVP-326	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-327	CAVP-327	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-328	CAVP-328	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-329	CAVP-329	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-330	CAVP-330	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices(b)	Maximum Capacity(c)	Date of Construct
10-331	CAVP-331	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-332	CAVP-332	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-333	SB24	SURGE BIN 24	None	Filter	0.57 tons/hour	N/A
10-334	CAVP-334	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-335	CAVP-335	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-336	CAVP-336	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-337	CAVP-337	CONAIR VACUUM PUMP	None	Filter	1.50 tons/hour	N/A
10-338	TC (C)	RECOVERY DEVICE	None	Cyclone	Less Than 100 lb/hr	N/A
10-339	F9DH	F9 DIE HOOD VENT	None	None	0.40 tons/hour	N/A
10-340	F-17 CYC	F-17 RECOVERY DEVICE	None	Cyclone	0.20 tons/hour	N/A
10-341	DHE (S1)	S1 DIE HEAD EXHAUST	None	None	0.55 tons/hour	N/A
10-342	MWS	MWS EXTRUDER AND DIE	None	None	0.50 tons/hour	N/A
10-343	CPVP1-4	CALIBRATOR PLATE VACUUM PUMPS	None	None	0.50 tons/hour	N/A
10-344	CPVP5-8	CALIBRATOR PLATE VACUUM PUMPS	None	None	0.50 tons/hour	N/A
10-345	MWSAO	MWS ANNEALLING OVEN	None	None	0.50 tons/hour	N/A
10-346	MWSCO	MWS CURE OVEN	None	None	0.50 tons/hour	N/A
10-347	F-903	FILTER RECEIVER	None	Filter	0.15 tons/hour	N/A
10-348	P3	P3 VACUUM PUMP SILOS 1 & 2	None	Filter	0.10 tons/hour	N/A
10-349	P4	P4 VACUUM PUMP SILOS 3 & 5	None	Filter	0.10 tons/hour	N/A
10-350	P5	P5 VACUUM PUMP SILOS 4 & 6	None	Filter	0.10 tons/hour	N/A
10-351	F908	F-908 FILTER RECEIVER	None	Filter	0.15 tons/hour	N/A
10-352	S-48	COATING ROOM LAB HOOD	None	None	N/A	N/A
10-353	MTLF18	CONAIR MATERIAL TRANSFER VENT LINE F-18	None	Filter	0.40 tons/hour	N/A
10-355	MTLF19	CONAIR MATERIAL TRANSFER VENT LINE F-19	None	Filter	0.40 tons/hour	N/A
10-356	F18BV	F-18 BARREL VENT	None	None	0.40 tons/hour	N/A
10-357	F19BV	F-19 BARREL VENT	None	None	0.40 tons/hour	N/A

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S-4, and S-5. The boilers described in Section K of this permit, E Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

L.2.1 Prevention of Significant Deterioration Minor Limit (PSD) [326 IAC 2-2]

(a) The input of volatile organic compound (VOC) to the C-41 and C-42 coating lines shall be limited to a total of 1860 tons per twelve (12) consecutive month period. This production limitation and use of one or more of the boilers, E BOILER, R BOILER, and BW-Boiler, for control as described in Condition K.2.2, is equivalent to 93 tons of VOC emissions per twelve (12) consecutive month period and is necessary to keep the net emission increase below PSD significant emission levels. This condition renders the requirements of 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

(b) [RESERVED]

L.2.2 National Emission Standards for Hazardous Air Pollutants: Paper and Other Web Coating [40 CFR Part 63, Subpart JJJJ]

The Permittee shall comply with the requirements of 40 CFR 63, Subpart JJJJ by limiting organic HAP emissions from coating lines S-4, S-5, C-6, C-45, C7A, C7B, and C8 to a level specified in 40 CFR 63.3320(b)(1), (2), or (3) during times one or more coating lines use a web substrate. Descriptions of these provisions can be found in Section LL.1(b)(1), (2), or (3) of this permit. The requirements of 40 CFR 63, Subpart JJJJ do not apply to S-4, S-5, C-6, C-45, C7A, C7B, and C8 when a coating substrate that is not flexible enough to be wound or unwound as rolls is used (i.e., a substrate that does not meet the definition of web established in 40 CFR 63.3310).

L.2.3 National Emission Standards for Hazardous Air Pollutants: Surface Coating of Plastic Parts and Products [40 CFR Part 63, Subpart PPPP]

In accordance with 40 CFR 63.4500(a)(1), the Permittee shall comply with the requirements of 40 CFR 63, Subpart PPPP, by using compliant materials that comply with the organic HAP emissions level specified in 40 CFR 63.4490(b)(1) for Sp-PPPC (including lines C-41 and C-42).

L.2.4 Volatile Organic Compounds (VOC) [326 IAC 8-2-5]

Pursuant to 326 IAC 8-2-5, the Permittee shall not allow the discharge into the atmosphere VOC in excess of two and nine-tenths (2.9) pounds per gallon excluding water, as delivered to the coating applicator of the S-4, S-5, C-6, C7A, C7B, and C8 coating lines.

L.2.5 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$$E = 4.10\ P^{0.67}$$

where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
10-010	EDV S5	1.70	5.85
10-011	EHV S4	1.23	4.71
10-012	EHV S3	0.33	1.95
10-013	EHV S1	0.20	1.39
10-014	PDH86	1.60	5.62

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
10-015	PDH85	1.60	5.62
10-016	PDH84	1.60	5.62
10-017	PDH83	1.60	5.62
10-018	PDH82	1.60	5.62
10-019	PDH81	1.60	5.62
10-020	PDH76	1.23	4.71
10-021	PDH75	1.23	4.71
10-022	PDH74	1.23	4.71
10-023	PDH73	1.23	4.71
10-024	PDH72	1.23	4.71
10-025	PDH71	1.23	4.71
10-026	PDH43	1.23	4.71
10-027	PDH45	1.23	4.71
10-028	PDH44	1.23	4.71
10-029	PDH42	1.23	4.71
10-030	PDH46	1.23	4.71
10-031	PDH41	1.23	4.71
10-032	PDH53	1.70	5.85
10-033	PDH51	1.70	5.85
10-034	PDH52	1.70	5.85
10-035	PDH37	0.33	1.95
10-036	PDH35	0.33	1.95
10-037	PDH36	0.33	1.95
10-038	PDH34	0.33	1.95
10-039	PDH31	0.33	1.95
10-040	PDH33	0.33	1.95
10-041	PDH32	0.33	1.95
10-042	PDH14	0.33	1.95
10-043	PDH13	0.55	2.75
10-044	PDH12	0.55	2.75
10-045	PDH11	0.55	2.75
10-046	PDH65	0.55	2.75
10-047	PDH64	0.55	2.75
10-048	PDH63	0.55	2.75
10-049	DHE (S8)	1.60	5.62
10-054	EDHE (S6)	0.55	2.75
10-055	DHE (S10)	0.55	2.75
10-055	DHE (S2)	0.20	1.39
10-056	PDH62	0.55	2.75
10-057	PDH61	0.55	2.75
10-077	PED	0.50	2.58
10-078	PDH161	0.50	2.58
10-079	PDH162	0.50	2.58
10-080	PDH163	0.50	2.58
10-081	PDH164	0.50	2.58
10-082	PDH165	0.50	2.58
10-083	PDH166	0.50	2.58
10-097	CAVP-097	1.50	5.38
10-098	CAVP-098	1.50	5.38
10-106	S1 BLOWER	5.43	12.7
10-107	S2 BLOWER	5.43	12.7
10-108	S3 BLOWER	5.43	12.7
10-112	PDH51N	0.10	0.877
10-113	PDH52N	0.10	0.877
10-114	PDH53N	0.10	0.877
10-115	CAVP-115	1.50	5.38
10-116	CAVP-116	1.50	5.38
10-117	CAVP-117	1.50	5.38
10-118	CAVP-118	1.50	5.38
10-120	PDH131	0.78	3.47
10-121	PDH132	0.78	3.47
10-122	PDH133	0.78	3.47

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
10-123	PDH134	0.78	3.47
10-124	PDH135	0.78	3.47
10-125	CAVP-125	1.50	5.38
10-126	CAVP-126	1.50	5.38
10-127	T13ED	0.46	2.44
10-128	CAVP-128	1.50	5.38
10-129	CAVP-129	1.50	5.38
10-130	CAVP-130	1.50	5.38
10-131	CAVP-131	1.50	5.38
10-134	PDH1413	1.23	4.71
10-135	PDH1414	1.23	4.71
10-136	PDH1411	1.23	4.71
10-136	PDH1421	1.23	4.71
10-136	PDH1431	1.23	4.71
10-137	PDH1412	1.23	4.71
10-137	PDH1432	1.23	4.71
10-138	PDH1441	1.23	4.71
10-138	PDH1451	1.23	4.71
10-138	PDH1461	1.23	4.71
10-139	PDH1442	1.23	4.71
10-139	PDH1452	1.23	4.71
10-139	PDH1462	1.23	4.71
10-146	F14ED	1.23	4.71
10-147	GS8-BH	0.12	0.990
10-148	G2	0.12	0.990
10-149	G1	0.06	0.620
10-150	G3	0.12	0.990
10-150	G4	0.12	0.990
10-152	F12ED	0.70	3.23
10-153	PDH121	0.70	3.23
10-154	PDH122	0.70	3.23
10-155	PDH123	0.70	3.23
10-156	PDH124	0.70	3.23
10-157	CAVP-157	1.50	5.38
10-158	CAVP-158	1.50	5.38
10-159	PDH111	0.55	2.75
10-160	PDH112	0.55	2.75
10-161	CAVP-161	1.50	5.38
10-180	RRC&C	1.60	5.62
10-181	SILO 1 BV	5.43	12.7
10-182	SILO 2 BV	5.43	12.7
10-183	SILO 3 BV	5.43	12.7
10-184	LPS BLOWER	0.50	2.58
10-185	F14 BV	1.23	4.71
10-186	S4 BV	1.20	4.63
10-187	S5 BV	1.75	5.97
10-189	DHE UCFL	0.20	1.39
10-191	PDH 1701	0.20	1.39
10-192	PDH 1702	0.20	1.39
10-193	PDH1703	0.20	1.39
10-194	PDH1704	0.20	1.39
10-195	CAVP-195	1.50	5.38
10-196	CAVP-196	1.50	5.38
10-300	PDH113	0.55	2.75
10-301	PDH114	0.55	2.75
10-302	PDH91	0.55	2.75
10-302	PDH92	0.55	2.75
10-303	PDH93	0.55	2.75
10-303	PDH94	0.55	2.75
10-304	PDH20	0.20	1.39
10-304	PDH21	0.20	1.39
10-304	PDH22	0.20	1.39

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
10-304	PDH23	0.20	1.39
10-305	PDH101	0.55	2.75
10-305	PDH104	0.55	2.75
10-306	PDH102	0.55	2.75
10-306	PDH103	0.55	2.75
10-307	PDH 54N	1.70	5.85
10-308	PDH55N	1.70	5.85
10-309	PDH56N	1.70	5.85
10-310	CAVP-310	1.50	5.38
10-311	CAVP-311	1.50	5.38
10-312	CAVP-312	1.50	5.38
10-313	CAVP-313	1.50	5.38
10-314	CAVP-314	1.50	5.38
10-315	CAVP-315	1.50	5.38
10-316	CAVP-316	1.50	5.38
10-317	CAVP-317	1.50	5.38
10-318	CAVP-318	1.50	5.38
10-319	CAVP-319	1.50	5.38
10-320	CAVP-320	1.50	5.38
10-321	CAVP-321	1.50	5.38
10-322	CAVP-322	1.50	5.38
10-323	CAVP-323	1.50	5.38
10-324	CAVP-324	1.50	5.38
10-325	CAVP-325	1.50	5.38
10-326	CAVP-326	1.50	5.38
10-327	CAVP-327	1.50	5.38
10-328	CAVP-328	1.50	5.38
10-329	CAVP-329	1.50	5.38
10-330	CAVP-330	1.50	5.38
10-331	CAVP-331	1.50	5.38
10-332	CAVP-332	1.50	5.38
10-333	SB24	0.57	2.81
10-334	CAVP-334	1.50	5.38
10-335	CAVP-335	1.50	5.38
10-336	CAVP-336	1.50	5.38
10-337	CAVP-337	1.50	5.38
10-339	F9DH	0.40	2.22
10-340	F-17 CYC	0.20	1.39
10-341	DHE (S1)	0.55	2.75
10-342	MWS	0.50	2.58
10-343	CPVP1-4	0.50	2.58
10-344	CPVP5-8	0.50	2.58
10-345	MWSAO	0.50	2.58
10-346	MWSCO	0.50	2.58
10-347	F-903	0.15	1.15
10-348	P3	0.10	0.877
10-349	P4	0.10	0.877
10-350	P5	0.10	0.877
10-351	F908	0.15	1.15
10-353	MTLF18	0.40	2.22
10-355	MTLF19	0.40	2.22
10-356	F18BV	0.40	2.22
10-357	F19BV	0.40	2.22

(b) Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from QABH, R&D CCRC, KE, TC (B) TC (A), and TC (C) shall not exceed 0.551 pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

L.2.6 Volatile Organic Compounds (VOC)[326 IAC 2-2]

(a) Whenever the C-41 and C-42 coating processes are operating, Conditions K.2.8 and K.2.14 of this permit apply.

(b) [RESERVED]

L.2.7 Volatile Organic Compounds (VOC)

Compliance with the VOC content and usage limitations contained in Condition L.2.1 and L.2.4 shall be determined pursuant to 326 IAC 8-1-4(a)(3)(A) or by using formulation data supplied by the coating manufacturer. However, IDEM, OAQ, reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.

L.2.8 Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart JJJJ]

Pursuant to 40 CFR 63, Subpart JJJJ, and in order to comply with Condition L.2.2, the Permittee shall comply with the applicable 40 CFR Part 63, Subpart JJJJ performance testing and compliance determination requirements listed in the following table for coating lines S-4, S-5, C-6, C-45, C7A, C7B, and C8 as applicable. The table also includes Section LL condition numbers where descriptions of the provisions can be found.

Section LL Permit Condition	Applicable 40 CFR Part 63, Subpart JJJJ Requirement	Regulatory Citation Description	S-4	S-5	C-6	C-45	C7A	C7B	C8
LL.2(a)(1)	63.3360(a)(1)	What performance tests must I conduct?	X	X	X	X	X	X	X
LL.2(c)	63.3360(c)	What performance tests must I conduct? - Organic HAP content	X	X	X	X	X	X	X
LL.2(d)	63.3360(d)	What performance tests must I conduct? - Volatile organic and coating solids content	X	X	X	X	X	X	X
LL.2(g)	63.3360(g)	What performance tests must I conduct? - Volatile matter retained in the coated web or otherwise not emitted to the atmosphere	X	X	X	X	X	X	X
LL.3(a)(1)	63.3370(a)(1)	How do I demonstrate compliance with the emissions standards - Use of “as-purchased” compliant coating materials	X	X	X	X	X	X	X
LL.3(a)(2)	63.3370(a)(2)	How do I demonstrate compliance with the emissions standards - Use of “as-applied” compliant coating materials	X	X	X	X	X	X	X
LL.3(a)(3)	63.3370(a)(3)	How do I demonstrate compliance with the emissions standards - Tracking total monthly organic HAP applied	X	X	X	X	X	X	X
LL.3(b)	63.3370(b)	How do I demonstrate compliance with the emissions standards - “As-purchased” compliant coating materials	X	X	X	X	X	X	X
LL.3(c)	63.3370(c)	How do I demonstrate compliance with the emissions standards - “As-applied” compliant coating materials	X	X	X	X	X	X	X
LL.3(d)	63.3370(d)	How do I demonstrate compliance with the emissions standards - Monthly allowable organic HAP applied	X	X	X	X	X	X	X
LL.3(l)	63.3370(l)	How do I demonstrate compliance with the emissions standards - Monthly allowable organic HAP emissions	X	X	X	X	X	X	X

L.2.9 Methods and Procedures [326 IAC 20-11][40 CFR 63, Subpart PPPP]

Pursuant to 40 CFR 63, Subpart PPPP, and in order to comply with Condition L.2.3, the Permittee shall comply with the applicable 40 CFR 63, Subpart PPPP compliance demonstration requirements listed in the following table for Sp-PPPC (including coating lines C-41 and C-42) as applicable.

Applicable 40 CFR Part 63, Subpart PPPP Requirements	Regulatory Citation Description	Sp-PPPC	
		C-41	C-42
63.4491(a)	What are my options for meeting the emission limits?	X	X
63.4492(a)	What operating limits must I meet?	X	X
63.4493(a)	What work practice standards must I meet?	X	X
63.4500(b)	What are my general requirements for complying with the subpart?	X	X
63.4540	By what date must I conduct the initial compliance demonstration?	X	X
63.4541	How do I demonstrate initial compliance with the emission limits?	X	X
63.4542	How do I demonstrate continuous compliance with the emission limitations?	X	X

L.2.10 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with L.2.4, the filters associated with facilities CAVP-097, CAVP-098, S1 BLOWER, S2 BLOWER, S3 BLOWER, CAVP-115, CAVP-116, CAVP-117, CAVP-118, CAVP-125, CAVP-126, CAVP-128, CAVP-129, CAVP-130, CAVP-131, GS8-BH, CAVP-157, CAVP-158, CAVP-161, TC (A), TC(B), SILO 1 BV, SILO 2 BV, SILO 3 BV, F14 BV, S4 BV, S5 BV, CAVP-195, CAVP-196, CAVP-310, CAVP-311, CAVP-312, CAVP-313, CAVP-314, CAVP-315, CAVP-316, CAVP-317, CAVP-318, CAVP-319, CAVP-320, CAVP-321, CAVP-322, CAVP-323, CAVP-324, CAVP-325, CAVP-326, CAVP-327, CAVP-328, CAVP-329, CAVP-330, CAVP-331, CAVP-332, SB24, CAVP-334, CAVP-335, CAVP-336, CAVP-337, TC (C), F-17 CYC, F-903, P3, P4, P5, F908, MTLF18, and MTLF19 shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

L.2.11 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust from emission units S1 BLOWER, S2 BLOWER, S3 BLOWER, SILO 1 BV, SILO 2 BV, and SILO 3 BV shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from S1 BLOWER, S2 BLOWER, S3 BLOWER, SILO 1 BV, SILO 2 BV, and SILO 3 BV, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

L.2.12 Record Keeping Requirements

(a) In order to document compliance with Conditions L.2.1 and L.2.4 the Permittee shall maintain records in accordance with (1) through (3) below. Records maintained for (1) through (3) shall be maintained for each calendar month and shall be sufficient to establish compliance with the VOC usage limits and/or the VOC emission limits established in Conditions L.2.1 and L.2.4. Records necessary to demonstrate compliance shall be available within 30 days of the end of each compliance period.

(1) The VOC content of each coating material and solvent used.

(2) The amount of coating material and solvent less water used on a monthly basis.

(A) Records shall be sufficient to verify the type and amount used and may include purchase orders, invoices, and material safety data sheets (MSDS) and other relevant information.

(B) Solvent usage records shall differentiate between those added to coatings and those used as cleanup solvents.

(3) The total VOC usage for each month.

(b) In order to document compliance with Condition L.2.2, the Permittee shall comply with the applicable 40 CFR Part 63, Subpart JJJJ record keeping and reporting requirements for coating lines S-4, S-5, C-6, C-45, C7A, C7B, and C8 as applicable. The table also includes Section LL condition numbers where descriptions of the provisions can be found.

Section LL Permit Condition	Applicable 40 CFR Part 63, Subpart JJJJ Requirement	Regulatory Citation Description	S-4	S-5	C-6	C-45	C7A	C7B	C8
LL.4(c)	63.3400(c)	What notifications and reports must I submit? - Semi-annual compliance report	X	X	X	X	X	X	X
LL.4(d)	63.3400(d)	What notifications and reports must I submit? - Notification of Performance Tests	X	X	X	X	X	X	X
LL.4(e)	63.3400(e)	What notifications and reports must I submit? - Notification of Compliance Status	X	X	X	X	X	X	X
LL.5(a)	63.3410(a)	What records must I keep?	X	X	X	X	X	X	X

(c) In order to document compliance with Condition L.2.3, the Permittee shall comply with the applicable 40 CFR 63, Subpart PPPP record keeping and reporting requirements for Sp-PPPC (including coating lines C-41 and C-42) as applicable.

Applicable 40 CFR Part 63, Subpart PPPP Requirements	Regulatory Citation Description	Sp-PPPC	
		C-41	C-42
63.4510(b)	What notifications must I submit? - Initial notification	X	X
63.4510(c)	What notifications must I submit? - Notification of compliance status	X	X
63.4520(a)	What reports must I submit? - Semiannual compliance report	X	X
63.4530(a)	What records must I keep?	X	X
63.4530(b)	What records must I keep?	X	X
63.4530(c)	What records must I keep?	X	X
63.4530(d)	What records must I keep?	X	X
63.4530(e)	What records must I keep?	X	X
63.4530(f)	What records must I keep?	X	X
63.4530(h)	What records must I keep?	X	X
63.4531	In what form and for how long must I keep my records?	X	X

(d) To document compliance with Condition L.2.11(a), the Permittee shall maintain the weekly record of the visible emission notations required by Condition L.2.11(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(e) All records required to be maintained by Condition L.2.12 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

L.2.13 Reporting Requirements

A quarterly summary of the information to document compliance with Condition L.2.1(a), shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

SECTION L.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Structured Products, Building 4

Temporary Boiler

(d) The boiler listed below represents a temporary, portable steam generating unit for Structured Products. The stack/vent I.D.; emission unit description; maximum heat capacity; and date of construction are in the table.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Maximum Capacity	Date of Construct
10-500	TEMPBOILER	Small natural gas or No.2 fuel oil fired boiler	10.468 MMBtu/hr	N/A

[(a)] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

L.3.1 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The temporary boiler, identified as TEMPBOILER, is an affected facility under 40 CFR 60, Subpart Dc. The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to TEMPBOILER.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
60.11(a)	Compliance with standards and maintenance requirements
60.11(d)	Compliance with standards and maintenance requirements
60.11(f)	Compliance with standards and maintenance requirements
60.11(g)	Compliance with standards and maintenance requirements

L.3.2 New Source Performance Standards (NSPS) [326 IAC 12] [40 CFR 60, Subpart Dc]

Pursuant to 40 CFR 60.42c(d) and 326 IAC 12, the Permittee shall not combust oil in the affected facility, TEMPBOILER, that contains greater than 0.5 percent by weight sulfur. The table that follows provides the specific applicable standards and monitoring provisions that apply to the TEMPBOILER.

Applicable 40 CFR Part 60, Subpart Dc Requirement	Regulatory Citation Description
60.42c(d)	Standard for Sulfur Dioxide
60.42c(i)	Standard for Sulfur Dioxide

L.3.3 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4(a) (Particulate Emission Limitations for Sources of Indirect Heating: emission limitations for facilities specified in 326 IAC 6-2-1(d)), particulate emissions from the boiler identified as TEMPBOILER shall not exceed 0.146 pounds of particulate matter per million British thermal unit (lb/MMBtu) heat input. This limitation was calculated using the following

equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

Where
Q = total source heat input capacity (MMBtu/hr)
For this unit, Q = 2,308.97 MMBtu/hr.

L.3.4 Significant Source Modification Avoidance Limit [326 IAC 2-7-10.5(f)]

In order to keep MSM 129-26621-00002 a minor source modification, the Permittee shall limit the hours of operation of the temporary boiler, identified as TEMPBOILER, to less than 1,500 hours per twelve (12) consecutive month period with compliance determined at the end of each month. Compliance with this limit on the hours of operation for the temporary boiler, identified as TEMPBOILER, along with emergency generators, identified as 17-500 and 17-501, will limit the potential to emit NOx below twenty-five (25) tons per year and will render the requirements of 326 IAC 2-7-10.5(f) not applicable to this modification.

Compliance Determination Requirements

L.3.5 Methods and Procedures [326 IAC 12] [40 CFR 60, Subpart Dc]

Pursuant to 40 CFR 60, Subpart Dc, compliance determination requirements for TEMPBOILER are identified in the following table:

Applicable 40 CFR Part 60, Subpart Dc Requirement	Regulatory Citation Description
60.42c(h)	Standard for Sulfur Dioxide
60.44c(h)	Compliance and Performance Test Methods and Procedures for Sulfur Dioxide
60.46c(e)	Emission Monitoring for Sulfur Dioxide

Pursuant to 40 CFR 60.42c(h), compliance with the fuel oil sulfur content limit of 0.05% by weight will be demonstrated via fuel supplier certification.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

L.3.6 Record Keeping and Reporting Requirements

(a) The table that follows provides record keeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to TEMPBOILER.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
60.7(a)	Notification and record keeping
60.7(b)	Notification and record keeping
60.7(f)	Notification and record keeping
60.(g)	Notification and record keeping

TEMPBOILER is a mass-produced facility deemed to be purchased in completed form; therefore, the notification requirement in 60.7(a)(1) does not apply.

(b) During periods when the TEMPBOILER is installed, the reporting and record keeping requirements of 40 CFR 60, Subpart Dc, §60.48c(a), (d), (e), (f), (g), (i) and (j) shall apply. Records of fuel oil combustion in the TEMPBOILER shall be maintained and reported as follows:

(1) Record and maintain records of the amount of each fuel combusted during each calendar month and the information required to be reported under (2) below:

(2) Submit reports for each 6-month period as required by 40 CFR 60.48c(j).

Each report shall include:

(A) Calendar dates covered in the reporting period.

(B) Fuel supplier certification, including the following information: name of the oil supplier, a statement from the fuel oil supplier that the fuel oil complies with the specifications under the definition of distillate oil in §60.41c, and sulfur content of the fuel oil.

(C) A certified statement signed by the owner or operator of the affected facility that the records of the fuel oil certifications submitted represent all of the fuel oil combusted during the reporting period.

(c) In order to document compliance with Condition L.3.4, monthly records of the hours of usage of the temporary boiler, identified as TEMPBOILER, shall be maintained.

(d) All records required by Condition L.3.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) A quarterly summary of the information to document compliance with Conditions L.3.4 shall be submitted to the address listed in Section C - General Reporting Requirements, using the reporting forms located at the end of Section L, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Section L consists of the following Sections: L.1, L.2, L.3 and one (1) Part 70 Usage Reporting Form, and one (1) Part 70 Quarterly Reporting Form.

Condition L.3.6 concludes the Section L requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Usage Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition L.3.4
Facility: Temporary Boiler, identified as TEMPBOILER
Parameter: Hours of Usage
Limit: Less than 1,500 hours per twelve (12) consecutive month period.

YEAR: _____ QUARTER:_____

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Quarterly Report

(Submit Report Quarterly)

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition L.2.1(b)
Facility: SHEETFUMES from Line 16 coating line
Parameter: VOC
Limit: The input of volatile organic compound (VOC) to the Line 16 coating line shall be limited to a total of 214.84 tons per twelve (12) consecutive month period.

YEAR: _____ QUARTER:_____

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

SECTION M.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: LEXAN# Development, Building 7

LEXAN# Development Operations

(a) The LDF operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
11-018	BFBPAH	RAW MATERIAL ADDITION V3011	None	None	0.15 tons/hour	N/A
11-020	C-3041	VENTILATION SYSTEM BLOWER	None	None	N/A	N/A
11-025	V-9111	V-9111 REFRIGERATED WATER SYSTEM	None	None	N/A	N/A
11-027	C-8123	VENT GAS ABSORBER	None	Scrubber*	N/A	N/A
11-123	F-3313	F-3313 DUST COLLECTOR	None	Bagfilter	0.15 tons/hour	N/A
11-148	C-9014	DI HCL DRUM SCRUBBER	None	None	N/A	N/A
11-149	V-9811	DIESEL FUEL TANK	None	None	N/A	N/A
11-150	FDCS	FUGITIVE DUST COLLECTION SYSTEM	None	Bagfilter	less than 100 lbs/hr	N/A
11-151	LDF-OQEDV	LDF OQ EXTRUDER AND DIE VENT	None	Bagfilter	less than 100 lbs/hr	N/A
11-152	LDF-OQEDC	LDF OQ EXTRUDER DUST COLLECTOR	None	Bagfilter	less than 100 lbs/hr	N/A
11-153	V-3060	V-3060	None	Bagfilter	0.15 tons/hour	N/A
11-154	F-3017	K-TRON FEEDER	None	Bagfilter	0.15 tons/hour	N/A
11-155	F-3315	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-156	F-3316	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-157	F-3317	RESIN DRYER	None	Bagfilter	0.15 tons/hour	N/A
11-158	F-6010	BPA UNLOADING SYSTEM	None	Bagfilter	0.15 tons/hour	N/A
11-159	F-6011	BPA RECEIVER	None	Bagfilter	0.15 tons/hour	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

* There are no regulatory requirements for this scrubber. This scrubber is part of the polycarbonate development process which processes methylene chloride which is not a VOC.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

Emission Limitations and Standards [326 IAC 2-7-5(1)]

M.1.1 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units BFBPAH, F-3313, and F-3311 shall not exceed the rates calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for these emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
11-018	BFBPAH	0.15	1.15
11-123	F-3313	0.15	1.15
11-153	V-3060	0.15	1.15
11-154	F-3017	0.15	1.15
11-155	F-3315	0.15	1.15
11-156	F-3316	0.15	1.15
11-157	F-3317	0.15	1.15
11-158	F-6010	0.15	1.15
11-159	F-6011	0.15	1.15

(b) Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission units FDCS, LDF-OQEDV, and LDF-OQEDC shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

M.1.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with M.1.1, the filters associated with emission units BFBPAH, F-3311, FDCS, LDF-OQEDV, LDF-OQEDC, V-3060, F-3017, F-3315, F-3316, F-3317, F-6010, and F-6011 shall be in operation at all times that material is being transferred into the facility.

Section M consists of the following Sections: M.1.

Condition M.1.2 concludes the Section M requirements of this permit

SECTION N.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: CPP Resin, Buildings 28, 34, and 60

CPP Resin Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the affected source or affected facility subject to the applicable regulation.

(a) Plant-MON identifies the affected source subject to 40 CFR 63, Subpart FFFF. Plant-MON is the facility wide collection of MCPU's and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials specified in 40 CFR 63.2435(b)(1) that are not otherwise exempted from requirements of 40 CFR 63, Subpart FFFF. A MCPU includes equipment necessary to operate the miscellaneous organic chemical manufacturing process, as defined in 40 CFR 63.2550, and includes assigned storage tanks and product transfer racks, equipment in open systems that is used to convey or store water having the same concentration and flow characteristics as wastewater, and components such as pumps, compressors, agitators, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, and instrumentation systems that are used to manufacture any material or family of materials described in 40 CFR 63.245(b)(1)(i) through (v). MCPUs subject to 40 CFR 63, Subpart FFFF are identified below:

(1) CppMONRes3 identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces CPP Resin.

(2) HppMONCoP1, HppMON CoP2, HppMON CoP3, and HppMON CoP4, identify MCPUs, as specified in 40 CFR 63.2435(b), that produce HPP Co-Polymer and conduct solvent recovery. HppMONCoP1, HppMON CoP2, HppMON CoP3, and HppMON CoP4 are located in HPP Co-Polymer, Section P of this Part 70 Permit.

(3) HppMONMon1 identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP monomer. HppMONMon1 is located in HPP ChemOps, Section Q of this Part 70 Permit.

(4) HppMONPol1 identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP polymer. HppMONPol1 is located in HPP ChemOps, Section Q of this Part 70 Permit.

(5) PhMON_PCP identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the PCP. PhMON_PCP is located in the Phenol plant, Section E of this Part 70 Permit.

(b) The affected facility subject to 40 CFR 60, Subpart NNN is identified as CppC-310. The affected facility consists of a device or vessel in which distillation operations occur, including all associated internals (such as tray or packing) and accessories (such as reboiler, condenser, vacuum pump, steam jet, etc.), plus any associated equipment, such as an absorber, carbon adsorber, or condenser, capable of and used for the purpose of recovering chemicals for use, reuse, or sale.

(c) CppVV is an affected facility in the CPP Process Unit subject to 40 CFR 60, Subpart VV. CppVV consists of components assembled to produce Methanol and includes pumps, compressors, pressure relief devices, sampling connection systems, open-ended valve or lines, valves, and flanges or other connectors in VOC service and any other devices or systems required by Subpart VV.

(d) [Reserved]

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

N.1.1 General Provisions Relating to NESHAP [326 IAC 20-1][40 CFR Part 63, Subpart A]

(a) The provisions of 40 CFR 63 Subpart A - General Provisions, which are incorporated as 326 IAC 20-1-1, apply to the affected source Plant-MON, which includes miscellaneous organic chemical manufacturing processing units identified as CppMONRes3, PhMON_PCP, HppMONCoP1, HppMONMon1, and HppMONPol1, as designated by 40 CFR 63.2440(b), except when otherwise specified in 40 CFR 63 Subpart FFFF.

(b) Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition N.1.7, National Emission Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing - Notification Requirements.

N.1.2 National Emissions Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing [40 CFR Part 63, Subpart FFFF]

(a) The affected source includes the facility-wide collection of miscellaneous organic chemical manufacturing processing units (MCPU) and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials described in 40 CFR 63.2435(b)(1) and is subject to the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Miscellaneous Organic Chemical Manufacturing, (40 CFR 63, Subpart FFFF), effective November 10, 2003. Pursuant to this rule, the Permittee must comply with 40 CFR 63, Subpart FFFF on and after the date specified in 40 CFR 63.2445(b), or such other compliance date authorized pursuant to 40 CFR 63.6; or accept and meet an enforceable HAP emissions limit below the major source threshold prior to November 10, 2006. Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition.

(b) The affected source that is subject to 40 CFR 63, Subpart FFFF includes each of the following miscellaneous organic chemical manufacturing units:

(1) CppMONRes3 identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces CPP Resin;

(2) PhMON_PCP (located in the phenol plant, Section E of this Part 70 Permit) identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces PCP;

(3) HppMONCoP1, HppMON CoP2, HppMON CoP3, and HppMON CoP4 (located in HPP Co-Polymer, Section P of this Part 70 Permit) identify MCPUs, as specified in 40 CFR 63.2435(b), that produce HPP Co-Polymer and conduct solvent recovery;

(4) HppMONMon1 (located in HPP ChemOps, Section Q of this Part 70 Permit) identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP monomer; and

(5) HppMONPol1 (located in HPP ChemOps, Section Q of this Part 70 Permit) identifies the MCPU, as specified in 40 CFR 63.2435(b), that produces the HPP polymer.

(c) The definitions set forth in 40 CFR 63.2550 are applicable to requirements established pursuant to 40 CFR 63, Subpart FFFF.

N.1.3 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities CppC-310 and CppVV. After the compliance dates specified in 40 CFR 63.2445, for either or both of the affected facilities, CppC-310 and CppVV, the Permittee may elect to comply with applicable requirements in 40 CFR Part 63, Subpart FFFF as provided in 40 CFR 63.2535(h)and (k); and the requirements set forth in this condition will no longer apply to such affected facility.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	CppC-310	CppVV
60.11(a)	Compliance with standards and maintenance requirements	X	X
60.11(d)	Compliance with standards and maintenance requirements	X	X

N.1.4 [Reserved]

Compliance Determination Requirements

N.1.5 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The table that follows provides performance testing requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities CppC-310 and CppVV. After the compliance dates specified in 40 CFR 63.2445, for either or both of the affected facilities, CppC-310 and CppVV, the Permittee may elect to comply with applicable requirements in 40 CFR Part 63, Subpart FFFF as provided in 40 CFR 63.2535(h) and (k); and the requirements set forth in this condition will no longer apply to such affected facility.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	CppC-310	CppVV
60.8(a)	Performance tests	X	X
60.8(b)	Performance tests	X	X

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	CppC-310	CppVV
60.8(c)	Performance tests	X	X
60.8(d)	Performance tests	X	X
60.8(e)	Performance tests	X	X
60.8(f)	Performance tests	X	X

N.1.6 Methods and Procedures [326 IAC 12] [40 CFR 60, Subpart NNN]

Pursuant to 40 CFR 60, Subpart NNN, test methods and procedures applicable to affected facility CppC-310 are identified in the following table, along with the condition number where descriptions of the provisions can be found in Section NN. After the compliance dates specified in 40 CFR 63.2445 for the affected facility, CppC-310, the Permittee may elect to comply with applicable requirements in 40 CFR 63, Subpart FFFF as provided in 40 CFR 63.2535(h); and the requirements set forth in this condition will no longer apply to such affected facility.

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title
HH.3(e)	60.664(f)	Test Methods and Procedures
HH.3(f)	60.664(g)	Test Methods and Procedures
HH.3(g)	60.664(h)	Test Methods and Procedures

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

N.1.7 National Emissions Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing - Notification Requirements [40 CFR 63, Subpart FFFF]

(a) Pursuant to 40 CFR 63.2515, the Permittee shall submit the notifications in 40 CFR 63.6(h)(4) and (5), 63.7(b) and (c), 63.8(e), (f)(4) and (6), and 63.9(b) through (h) that apply to the affected source Plant-MON and chosen compliance method by the dates specified. These notifications include, but are not limited to, the following:

(1) An Initial Notification containing the information specified in 40 CFR 63.9(b)(2); and

(2) If required to conduct a performance test, a notification of intent to conduct a performance test at least 60 calendar days before the performance test is scheduled to begin as required by 40 CFR 63.7(b)(1) and 40 CFR 63.2515(c). For any performance test required as part of the initial compliance procedures for batch process vents in Table 2 to 40 CFR 63, Subpart FFFF, the Permittee shall submit the test plan required by 40 CFR 63.7(c) and the emission profile with the notification of the performance test.

(b) Pursuant to 40 CFR 63.2520(a), the Permittee shall submit a precompliance report to request approval for any of the items in 40 CFR 63.2520(c)(1) through (7) at least six (6) months prior to the date specified in 40 CFR 63.2445(b).

(c) Pursuant to 40 CFR 63.2520(d), the Permittee shall submit a notification of compliance status report according to the schedule in paragraph (1), and the notification of compliance status report must contain the information specified in paragraph (2).

(1) The Permittee shall submit the notification of compliance status report no later than 150 days after the date specified in 40 CFR 63.2445(b).

(2) The notification of compliance status report shall include the information in 40 CFR 63.2520(d)(2)(i) through (ix).

(d) The notifications required by paragraphs (a) through(c) shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The notifications require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

N.1.8 Requirement to Submit a Significant Permit Modification Application [326 IAC 2-7-12] [326 IAC 2-7-5]

The Permittee shall submit an application for a significant permit modification to IDEM, OAQ to include information regarding which compliance option or options will be chosen in the Part 70 permit.

(a) The significant permit modification application shall be consistent with 326 IAC 2-7-12, including information sufficient for IDEM, OAQ to incorporate into the Part 70 permit the applicable requirements of 40 CFR 63, Subpart FFFF, a description of the affected source and activities subject to the standard, and a description of how the Permittee will meet the applicable requirements of the standard.

(b) The significant permit modification application shall be submitted no later than 150 days after the date specified in 40 CFR 63.2445(b).

(c) The significant permit modification application shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue
M 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

N.1.9 Record Keeping and Reporting Requirements

(a) The table that follows provides record keeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to affected facilities CppC-310 and CppVV. After the compliance dates specified in 40 CFR 63.2445, for either or both of the affected facilities, CppC-310 and CppVV, the Permittee may elect to comply applicable requirements in 40 CFR Part 63, Subpart FFFF as provided in 40 CFR 63.2535(h) and (k); and the requirements set forth in this condition will no longer apply to such affected facility.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description	CppC-310	CppVV
60.7(a)	Notification and record keeping	X	X
60.7(b)	Notification and record keeping	X	
60.7(f)	Notification and record keeping	X	X
60.7(g)	Notification and record keeping	X	X
60.7(h)	Notification and record keeping	X	X

(b) All records required to be maintained by Condition N.1.9 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit the reports and records required to be submitted by Condition N.1.9 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION N.2 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: CPP Resin, Buildings 28, 34, and 60

CPP Resin Process Operations

(e) The CPP Resin process operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-154	E-314*	V-310 MeOH STORAGE TANK (note: V-310 is the C-310 distillation overheads receiver)	None	Condenser	N/A	Prior 1985
12-155	E-313	CONDENSER E-313	None	E-313 is recovery device	N/A	1983
12-169	H-390	H-390 HOT OIL HEATER CAPABLE OF BURNING NATURAL GAS AND OFF GAS	None	None	17.28 MMBtu/hr	1984

Insignificant Activities [(d)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-172	W370A/B	TRANSFER BINS W-370/A/B	None	None	13.75 tons/hr	N/A
12-230	DTL	BD TRUCK LOADING	None	None	N/A	N/A
12-247	PD-470A	PELLETIZER DRYER D-470A	None	None	3.44 tons/hr	N/A
12-247	PD-470B	PELLETIZER DRYER D-470B	None	None	3.44 tons/hr	N/A
12-251	E-602	THF UNLOADING FACILITY TANK V-600	None	None	N/A	N/A
12-356	PD-370A	PELLETIZER DRYER D-370A	None	None	3.44 tons/hr	N/A
12-356	PD-370B	PELLETIZER DRYER D-370B	None	None	3.44 tons/hr	N/A
12-357	VLX CTC1	VALOX COOLING TOWER CELL 1	None	None	N/A	N/A
12-358	VLX CTC2	VALOX COOLING TOWER CELL 2	None	None	N/A	N/A
12-359	H-370	DIE HEAD CLEANING OVEN H-370	None	None	N/A	N/A
12-561	V-496	V-496 RAIL CAR UNLOADING	None	None	N/A	N/A
12-586**	BOVEN	H-390 OFF GAS VENT	None	None	N/A	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The distillation operation identified as C-310 is subject to NSPS requirements. C-310 vents through stack/vent 12-154, identified as emission unit E-314.

** S/V 12-586 is a stack that provides by-pass from H-390 for process safety purposes; 12-586 is normally not an active vent.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

N.2.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to PC (65) 1813, Condition 4, issued on December 21, 1989, any change or modification which increases the total VOC emissions from emission units E-314, E-313, and the emission units listed in Condition N.3.1 to 23.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions E.2.1(a), E.3.1, F.4.1, and N.3.1 ensures that the net emission increase from the 1989 expansion project (pursuant to PC (65) 1813, issued on December 21, 1989, as amended in this Title V permit) is below PSD significant emission levels and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

N.2.2 Particulate Matter (Sources of Indirect Heating) [326 IAC 6-2-4(a)]

Pursuant to 326 IAC 6-2-1(g), the PM emissions from H-390 shall be limited to 0.16 pounds per MMBtu heat input.

N.2.3 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	Max Process Weight Rate (tons/hr)	Rate of Emission (lb/hr)
12-172	W370A/B	13.75	23.7
12-247	PD-470A	3.44	9.38
12-247	PD-470B	3.44	9.38
12-356	PD-370A	3.44	9.38
12-356	PD-370B	3.44	9.38

N.2.4 VOC Emissions from Synthetic Organic Chemical Manufacturing Industry [326 IAC 12] [40 CFR 60, Subpart NNN]

Pursuant to 40 CFR 60.660(c)(6), if the Permittee maintains the flow rate of the C-310 distillation operation vent stream to less than 0.008 standard cubic meters per minute, then C-310 is exempt from all provisions of Subpart NNN except for 40 CFR 60.664(h); and 60.665 (i), (l)(5), and (o). Instead of complying with this provision, the Permittee may elect the alternative operating scenario for the C-310 vent stream as described in Condition N.2.5, or after the compliance date, elect compliance pursuant to 40 CFR 63, Subpart FFFF as provided in 40 CFR 63.2535(h).

N.2.5 Alternative Operating Scenario for C-310 to comply with 40 CFR 60, Subpart NNN [326 IAC 12] [40 CFR 60, Subpart NNN]

Instead of complying with the provisions of Condition N.2.4, the Permittee may elect to comply with the alternative operating scenario described in this condition. If this alternative is chosen, then pursuant to 40 CFR 60.660(c)(4), the Permittee shall maintain a total resource effectiveness (TRE) greater than 8.0 for the C-310 vent stream and be exempt from all provisions of Subpart NNN except for 40 CFR 60.662; 60.664(e), (f), and (g); and 60.665 (h) and (l).

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

N.2.6 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 60, Subpart NNN and in order to document compliance with Condition N.2.4, the Permittee shall keep records and submit reports as specified in the applicable 40 CFR Part 60, Subpart NNN requirements listed in the following table. The table also includes Section HH condition numbers where descriptions of these provisions can be found.

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title	C-310 Vent Stream
HH.4(i)	60.665(i)	Reporting and Recordkeeping Requirements	X
HH.4(l)	60.665(l)	Reporting and Recordkeeping Requirements	X
HH.4(o)	60.665(o)	Reporting and Recordkeeping Requirements	X

(b) If the Permittee chooses to comply with the alternative operating scenario by maintaining a total resource effectiveness (TRE) greater than 8.0 for the C-310 vent stream as described in Condition N.2.5, then the Permittee shall keep records and submit reports as specified in the applicable 40 CFR Part 60, Subpart NNN citations in the table below. The table also includes Section HH condition numbers where descriptions of these provisions can be found.

Section HH Permit Condition	Applicable 40 CFR Part 60, Subpart NNN Requirement	Regulatory Citation Title	C-310 Vent Stream
HH.4(h)	60.665(h)	Reporting and Recordkeeping Requirements	X
HH.4(l)	60.665(l)	Reporting and Recordkeeping Requirements	X

(c) Pursuant to 326 IAC 2-7-20(d) and 326 IAC 2-7-5(9), if an alternative operating scenario is applicable, the Permittee shall keep a record of the alternative scenario it operates as detailed in Condition N.2.5 A summary of these records shall be included with the annual compliance certification submitted pursuant to Section B.10 - Annual Compliance Certification.

(d) All records required to be maintained by Condition N.2.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition N.2.6 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION N.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: CPP Resin, Buildings 28, 34, and 60

CPP Resin Area Tanks

(f) Tanks located in the CPP Resin Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate; the date of construction; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
12-008	E-104A	MeOH STORAGE TANK T104A	None	Condenser	90.84 m^3	1973
12-112	E-104B	MeOH STORAGE TANK T104B	None	Condenser	113.5 m^3	1975
12-150	V-318	V-318 DOW G STORAGE TANK	None	None	4.1 m^3	1983
12-153	JKD 308	V-308 BD MeOH STORAGE TANK	None	Condenser	6.7 m^3	1984
N/A	T-1122	T-1122	None	None	100 m^3	1990
12-560	V-401	DMT TANK V-401	V301/401SC*	None	417 m^3	1988

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
12-003	TK-106	BD RECOVERY TANK T106	None	None	N/A	Prior to 1984
12-006	TK-102	BD STORAGE TANK T102	None	None	215 m^3	1973
12-114	E-1110	BD STORAGE TANK (T-1110)	None	None	193 m^3	1989
12-122	T-119	HOT OIL STORAGE TANK TK-119	None	None	37.9 m^3	N/A
12-148	V-303	V-303 BD STORAGE TANK	None	None	24 m^3	1984
12-149	V-304	V-304 BD STORAGE TANK	None	None	96 m^3	1984
12-152	V-307	V-307 BD STORAGE TANK	None	None	417 m^3	1984
12-156	E-322	V-320/E-322 BD MeOH STORAGE TANK	None	Condenser	3.3 m^3	1984
12-157	JKD PIPE	V330 BD MeOH STORAGE TANK	None	Condenser	3.3 m^3	1984
12-158	JACK PIPE	V-431 MeOH STORAGE TANK	None	Condenser	1.0 m^3	1988
12-159	V-340	V-340 BD STORAGE TANK	None	None	5.6 m^3	1984
12-160	V-450	V-450 BD STORAGE TANK	None	None	6.4 m^3	N/A
12-161	V-351	V-351 DOW A STORAGE TANK	None	None	3.5 m^3	1984
12-162	V-360	V-360 BD STORAGE TANK	None	None	6.4 m^3	1984
12-163	V-362	V-362 BD STORAGE TANK	None	None	3.5 m^3	1984
12-164	V-363	V-363 DOW G STORAGE TANK	None	None	2.0 m^3	N/A
12-165	V-364	V-364 MeOH STORAGE TANK	None	None	6.7 m^3	1984
12-166	V-390	V-390 DOW G STORAGE TANK	None	None	52 m^3	1984
12-168	V-392	V-392 DOW G STORAGE TANK	None	None	3.7 m^3	1984
12-229	V-460	V-460 BD STORAGE TANK	None	None	8.7 m^3	1988
12-560	V-301	DMT STORAGE TANK	V301/401SC*	None	N/A	N/A
12-359	V-302	DMT STORAGE TANK	None	None	17.1 m^3	1984
12-359	V-306	TPT STORAGE TANK	None	None	0.8 m^3	1984

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* Emissions from DMT storage tanks V-301 and V-401 are routed to the scrubber identified as V301/401SC.
(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

N.3.1 Prevention of Significant Deterioration (PSD) Minor Modification Limit [326 IAC 2-2]

Pursuant to PC (65) 1813, Condition 4, issued on December 21, 1989, any change or modification which increases the total VOC emissions from emission units V-304, V-307, JKD 308, E-322, JKD PIPE, JACK PIPE, V-340, V-450, V-364, V-390 and the emission units listed in Condition N.2.1 to 23.0 tons per year or greater must receive prior approval from IDEM, OAQ. Compliance with this Condition and Conditions E.2.1(a), E.3.1, F.4.1, and N.2.1 ensures that the net emission increase from the 1989 expansion project (pursuant to PC (65) 1813, issued on December 21, 1989, as amended by this Title V permit) is below PSD significant emission levels and renders the requirements of 326 IAC 2-2 Prevention of Significant Deterioration not applicable.

N.3.2 Volatile Organic Compounds (VOC) [326 IAC 8-1-6]

Pursuant to CP 129-5947-00002, Condition 3, issued on October 1, 1996, and revised through the Title V permit:

(a) Emissions from emission unit V-301 shall not exceed 24.0 tons of VOC per 12 consecutive month period with compliance determined at the end of each month.

(b) Combined VOC emissions from tanks V-301 and V-302 shall not exceed 24.9 tons per year.

Compliance with these limits make the total VOC emissions less than 25 tons per year and renders the requirements of 326 IAC 8-1-6, New Facilities, General Reduction Requirements not applicable to the 1996 DMT liquid storage modification.

N.3.3 Volatile Organic Liquid Storage Vessels [326 IAC 12-1] [40 CFR 60, Subpart Kb]

(a) Pursuant to 40 CFR 63.112b(a), the Permittee shall comply with the Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984 [40 CFR 60, Subpart Kb] by meeting the applicable emission standards and monitoring provisions of 40 CFR 60.112b(a)(3) for the storage vessel identified as V-401.

(b) Pursuant to 40 CFR 60.112b(a)(3), the storage vessel identified as V-401 is controlled by a closed vent system and scrubber identified as V301/401SC. Descriptions of these provisions can be found in Section KK.

(1) Pursuant to 40 CFR 60.112b(a)(3)(i), the closed vent system shall be designed to collect all VOC vapors and gases discharged from the storage vessel identified as V-401 and operated with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background and visual inspections, as determined in 40 CFR 60.485(b).

(2) Pursuant to 40 CFR 60.112b(a)(3)(ii), the scrubber identified as V301/401SC shall be designed and operated to reduce inlet VOC emissions by 95 percent or greater.

Compliance Determination Requirements

N.3.4 Volatile Organic Compounds (VOC) Control

For purposes of determining compliance with Condition N.3.2, the Permittee shall use the following equation to determine the VOC emissions for each month, and then sum the monthly emissions for the most recent 12 consecutive month period:

$$VOCEmissions = \left[\frac{1Ton}{2000lbs}\right] \otimes \left[\left(T1_{SCRUB} \otimes EF1_{DMT}\right) \oplus \left(T2_{ATM} \otimes EF2_{DMT}\right) \oplus \left(T3_{ATM} \otimes EF3_{DMT}\right)\right]$$

Where:

$T1_{SCRUB}$ = Number of hours tank V-301 operated normally and was vented through the scrubber during the month.

$EF1_{DMT}$ = Emission factor of 5.47 lb VOC/hr or the emission factor determined in the most recent performance test.

$T2_{ATM}$ = Number of hours tank V-301 was vented directly to the atmosphere with no truck or railcar unloading during the month;

$EF2_{DMT}$ = Emission factor of 5.47 lb VOC/hr or the emission factor determined in the most recent performance test.

$T3_{ATM}$ = Number of hours tank V-301 was vented directly to the atmosphere with truck or railcar unloading during the month; and

$EF3_{DMT}$ = Emission factor of 5.47 lb VOC/hr or the emission factor determined in the most recent performance test.

N.3.5 Testing and Procedures Required by 40 CFR 60, Subpart Kb [326 IAC 12-1] [40 CFR 60, Subpart 60.113b]

(a) Pursuant to 40 CFR 60.113b(c)(2) and in order to determine compliance with Condition N.3.3, the Permittee shall monitor the following parameters of the closed vent system and control device in accordance with the operating plan submitted to IDEM, OAQ:

Stack/Vent	Control or Recovery Device To Be Monitored	Parameter(s) To Monitor	Parameter Range
12-560	Eductor	Methanol Flow Rate	≥ 30 gallons per minute (GPM)
12-560	Heat Exchanger E415	Outlet Temperature of Vapor	≤ 45℃
12-560	Packed Column C410	Water Flow Rate	≥ 4.6 gallons per minute (GPM)

If the Permittee elects to comply with the provisions set forth in 40 CFR 63.2535(c), as provided in Condition N.3.3(c), the monitoring requirements of this condition N.3.5(a) shall not apply.

(b) In order to demonstrate compliance with Condition N.3.2, the Permittee shall conduct a performance test to verify the emission factors in Condition N.3.4, using methods as approved by the Commissioner within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002 on the following:

(1) The outlet of the scrubber identified as V301/401SC to verify the emission factor, EF1DMT, used during times V-301 is vented through the scrubber. This test shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration;

(2) The tank identified as V-301 shall be tested to verify the emission factor, EF3DMT, used during times the tank vented directly to the atmosphere while truck or railcar unloading; and

(3) The tank identified as V-301 shall be tested to verify the emission factor, EF2DMT, used during times the tank vented directly to the atmosphere without truck or railcar unloading.

The resulting emission factors from these tests shall be used in the equation specified in Condition N.3.4. Testing shall be conducted in accordance with Section C - Performance Testing.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

N.3.6 Record Keeping and Reporting Requirements

(a) In order to document compliance with Condition N.3.2 and N.3.4, the Permittee shall maintain records in accordance with (1) through (4) below. Records for (1) through (4) shall be maintained for each month and shall be sufficient to establish compliance with the VOC emission limit established in Condition N.3.2. Records necessary to demonstrate compliance shall be available within 30 days of the end of each compliance period.

(1) The amount of time, in hours, V-301 is vented through the scrubber; directly to the atmosphere with no truck or railcar unloading; and directly to the atmosphere with truck or railcar unloading;
(2) The amount of VOCs emitted from storage tank V-301, calculated pursuant to Condition N.3.4, and include the amount of VOCs emitted from each type of venting option;
(3) Number of startups for tank V-302; and
(4) Material safety data sheets (MSDS) for DMT.

(b) Pursuant to 40 CFR 60, Subpart Kb and in order to document compliance with Condition N.3.3, the Permittee shall keep records and submit reports as specified in the applicable 40 CFR 60, Subpart Kb requirements listed in the following table, the table also includes Section KK condition numbers where descriptions of these provisions can be found. The applicable requirements in the table below do not apply if after the compliance date the Permittee elects to comply with the requirements for Group 1 storage tanks pursuant to 40 CFR 63.2535(c).

Section KK Permit Condition	Applicable 40 CFR Part 60, Subpart Kb Requirement	Regulatory Citation Title	V301/401SC
KK.3(c)	60.115b(c)	Reporting and Recordkeeping Requirements	X
KK.4(a)	60.116b(a)	Monitoring of Operations	X
KK.4(b)	60.116b(b)	Monitoring of Operations	X

(c) All records required to be maintained by Condition N.3.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

N.3.7 Reporting Requirements

(a) A quarterly summary of the information to document compliance with Condition N.3.2 shall be submitted to the address listed in Section C- General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or the equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

(b) The Permittee shall submit the reports and records required to be submitted by Condition N.3.7 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION N.4 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: CPP Resin, Buildings 28, 34, and 60

CPP Resin Leak Detection and Repair (LDAR) Components

(g) LDAR applies to the collection of all equipment (as defined in 40 CFR 60.481) located in the CppVV affected facility. This equipment includes each pump, compressor, agitator, pressure relief device, sampling connection system, open-ended valve or line, valve, and flange or other connector that is in VOC service. In VOC service means that a piece of equipment either contains or contacts a fluid (liquid or gas) that is at least 10 percent by weight of VOC. [40 CFR 60.481] For clarification purposes, CppVV equipment operates in methanol (VOC) service.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

N.4.1 Equipment Leaks [326 IAC 12] [40 CFR 60, Subpart VV]

Pursuant to 40 CFR 60.482-1, Subpart VV, the Permittee shall control leaks of VOCs from each pump, compressor, pressure relief device, sampling connection system, open-ended valve or line, valve, and flange or other connector in VOC service; and any devices or systems required by Subpart VV according to the applicable 40 CFR 60, Subpart VV requirements in the following table unless, after the compliance date of 40 CFR 63, Subpart FFFF, the Permittee elects to comply with 40 CFR 63, Subpart FFFF pursuant to 40 CFR 63.2535(k). The following table also contains Section GG condition numbers where descriptions of the Subpart VV provisions can be found.

Section GG Permit Condition	Applicable 40 CFR Part 60, Subpart VV Requirement	Regulatory Citation Title
GG.1	60.482-2	Standards: Pumps in Light Liquid Service
GG.2	60.482-3	Standards: Compressors
GG.3	60.482-4	Standards: Pressure Relief Devices in Gas/Vapor Service
GG.4	60.482-5	Standards: Sampling Connection Systems
GG.5	60.482-6	Standards: Open-Ended Valves or Lines
GG.6	60.482-7	Standards: Valves in Gas/Vapor Service and in Light Liquid Service
GG.7	60.482-8	Standards: Pumps and Valves in Heavy Liquid Service, Pressure Relief Devices in Light Liquid or Heavy Liquid Service, and Connectors
GG.8	60.482-10	Standards: Closed Vent Systems and Control Devices
GG.9	60.482-9	Standards: Delay of Repair
GG.10	60.482-1	Monitoring Requirements
GG.11	60.483-1	Alternative standards for valves-allowable percentage of valves leaking.
GG.12	60.483-2	Alternative standards for valves-skip period leak detection and repair.
GG.13	60.485	Test Methods and Procedures

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

N.4.2 Record Keeping and Reporting Requirements

(a) Pursuant to 40 CFR 60.486 and 60.487, Subpart VV and to document compliance with Condition N.4.1, the Permittee shall keep records and submit reports as specified in the applicable 40 CFR Part 60, Subpart VV citations in the following table, unless, after the compliance date, the Permittee elects to comply with 40 CFR 63, Subpart FFFF pursuant to 40 CFR 63.2535(k). The following table also contains Section GG condition numbers where descriptions of the Subpart VV provisions can be found.

Section GG Permit Condition	Applicable 40 CFR Part 60, Subpart VV Requirement	Regulatory Citation Title
GG.14	60.486	Recordkeeping Requirements
GG.15	60.487	Reporting Requirements

(b) All records required to be maintained by Condition N.4.2 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit the reports and records required to be submitted by Condition N.4.2 to the address listed in Section C - General Reporting Requirements, of this permit.

Section N consists of the following Sections: N.1, N.2, N.3, N.4, and one (1) Part 70 Quarterly Reporting Form.

Condition N.4.2 concludes the Section N requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002
Facility: V-301; S/V 12-560; Condition N.3.2(a)
Parameter: VOC
Limit: 24.0 tons of VOC per 12 month period, with compliance determined at the end of each month.

QUARTER: _____ YEAR:

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report

SECTION O.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: CPP Finishing, Buildings 29 and 30

CPP Finishing Operations

(a) The CPP Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Insignificant Activities [(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [(b)]	Maximum Capacity [(c)]	Date of Construct
12-039	CL2RH	CL2 RESIN HOPPER	None	None	0.5 tons/hour	N/A
12-042	V-506D	V-506 ELUTRIATOR DUST COLLECTOR	Filter	None	2 tons/hour	N/A
12-057	V-506	V506 RESIN HOPPER	None	None	2 tons/hour	N/A
12-072	SILO J	J RAW MATERIAL SYSTEM	None	Filter	1.5 tons/hour	N/A
12-073	SILO K	K RAW MATERIAL SYSTEM	None	Filter	1.5 tons/hour	N/A
12-137	L12RBF/A	L12 195 HOPPER	None	Filter	1.2 tons/hour	N/A
12-138	L12RBF/B	L12 315 HOPPER	None	Filter	1.2 tons/hour	N/A
12-142	L13RBF/A	L13 195 HOPPER	None	Filter	1.2 tons/hour	N/A
12-143	L13RBF/B	L13 315 HOPPER	None	Filter	1.2 tons/hour	N/A
12-145	L4CF	L4/12/13 CENTRAL COLLECTION SYSTEM	None	Filter	3.5 tons/hour	N/A
12-170	CSM	CHIP SILO M	None	None	5 tons/hour	N/A
12-171	CSN	CHIP SILO N	None	None	5 tons/hour	N/A
12-173	BCB (VLX)	BAG COLLECTOR BLOWER	None	Filter	5 tons/hour	N/A
12-181	CL4RBF/A	BAG FILTER 315	None	Filter	0.5 tons/hour	N/A
12-182	CL4RBF/B	BAG FILTER 195	None	Filter	0.5 tons/hour	N/A
12-185	L15RBF/A	V1501 L15 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-186	L15RBF/B	V1502 L15 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-189	L16RBF/A	V1601 L16 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-190	L16RBF/B	V1501T L16 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-193	L17RBF/A	V1701 L17 195 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-194	L17RBF/B	V1701 L17 315 RESIN FLEX - KLEEN BAG FILTER	None	Filter	2.5 tons/hour	N/A
12-195	FRSS	FR STORAGE SILO	None	Filter	less than 100 lbs/hr	N/A
12-196	FPRCS2	HOFFMAN BLOWER K-005	None	Filter	9 tons/hour	N/A
12-197	L14EFP	COMP-2 BLOWER K-003	None	Filter	less than 100 lbs/hr	N/A
12-201	L8LPSA	LEXAN# POWDER SILO A F812A	None	Filter	1.5 tons/hour	N/A
12-203	L8RBF/A	V915 LINE 8 195 VESSEL	None	Filter	2.5 tons/hour	N/A
12-204	L8RBF/B	V1515B LINE 8 315 VESSEL	None	Filter	2.5 tons/hour	N/A

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-205	L8LPF	L8 LEXAN# POWDER DAY BIN BAG FILTER A	None	Filter	1.5 tons/hour	N/A
12-206	L15-17	EXTRUDER FUME VENTILATION LINES 15-17 SOUTH	None	None	0.3465 tons/hour	N/A
12-207	FCDC2	L5 ROOF TOP MICA HOPPER	None	Filter	1.75 tons/hour	N/A
12-208	BLS-A	BULK LOADING SILO A	None	None	3 tons/hour	N/A
12-209	BLS-B	BULK LOADING SILO B	None	None	3 tons/hour	N/A
12-210	BLS-C	BULK LOADING SILO	None	None	3 tons/hour	N/A
12-211	BLS-D	BULK LOADING SILO D	None	None	3 tons/hour	N/A
12-212	BLSDEF-A	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-213	BLSDEF-B	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-214	BLSDEF-C	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-215	BLSDEF-D	BULK LOADING SILO DISPLACEMENT EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-216	BLSW-A	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-217	BLSW-B	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-218	BLSW-C	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-219	BLSW-D	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-220	BLSE-A	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-221	BLSE-B	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-222	BLSE-C	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-223	BLSE-D	BLS LOADING EXHAUST	None	None	10 tons/hour	N/A
12-226	L17LPRF	L17 LEXAN# POWDER RECEIVER BAG FILTER	None	Filter	1.5 tons/hour	N/A
12-248	BLSABB	BULK LOADING SILO A BLENDING BLOWER	None	Filter	10 tons/hour	N/A
12-249	BLSBBB	BULK LOADING SILO B BLENDING BLOWER	None	Filter	10 tons/hour	N/A
12-250	RSH2	V-507 STORAGE HOPPER	None	None	3 tons/hour	N/A
12-253	V-1620	L16 IMPACT MODIFIER SURGE HOPPER (EXTRUDER LINE 16)	None	None	1 tons/hour	N/A
12-254	V-1720	L17 IMPACT MODIFIER SURGE HOPPER (EXTRUDER LINE 17)	None	None	1 tons/hour	N/A
12-257	FPRCS1	HOFFMAN BLOWER K-2001	None	Filter	9 tons/hour	N/A
12-258	F-1804	DUST COLLECTION SYSTEM (F1804) - WET SCRUBBER FOR L18	None	Rotoclone	2.5 tons/hour	N/A
12-259	F-1801	V-1804 RESIN BIN WITH F-1801 VENT FILTER - BIN FILTER (L18&19)	None	Filter	2.5 tons/hour	N/A
12-260	F-1802	V-1805 RESIN BIN WITH F-1802 VENT FILTER - BIN FILTER (L18&19)	None	Filter	2.5 tons/hour	N/A
12-261	V-1808A	V-1808A LEXAN# PELLET BIN	None	None	2.5 tons/hour	N/A
12-262	V-1808B	V-1808B LEXAN# PELLET BIN	None	None	2.5 tons/hour	N/A
12-263	V-1806	V-1806 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-264	V-1815	V-1815 LEXAN# POWDER RECEIVER	None	Filter	1.5 tons/hour	N/A
12-265	V-1801	V-1801 RECYCLE BIN	None	None	1.875 tons/hour	N/A
12-266	V-1803	L18 V-1803 FLAME RETARDANT	None	None	2.5 tons/hour	N/A
12-267	V-1807	L18 LEXAN# V-1807 MISCELLANEOUS PELLET BIN	None	None	2.5 tons/hour	N/A
12-268	L18E	EXTRUDER FUME VENTILATION LINE 18	None	None	2.5 tons/hour	N/A
12-268	L19E	EXTRUDER FUME VENTILATION LINE 19	None	None	2.5 tons/hour	N/A

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Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-269	F-1901	L19 DUST COLLECTION SYSTEM (F1901) - WET SCRUBBER	None	Rotoclone	2.5 tons/hour	N/A
12-270	F-1902	V-1930 RESIN BIN WITH F-1902 VENT FILTER	None	Filter	2.5 tons/hour	N/A
12-271	V-1931	V-1931 MISCELLANEOUS PELLET BIN	None	Filter	2.5 tons/hour	N/A
12-272	V-1932	V-1932 LEXAN# POWDER BIN	None	Filter	2.5 tons/hour	N/A
12-273	V-1905	V-1905 LEXAN# POWDER RECEIVER	None	Filter	2.5 tons/hour	N/A
12-274	V-1928	L19 V-1928 FLAME RETARDANT BIN	None	None	2.5 tons/hour	N/A
12-275	V-1929	L19 V-1929 FLAME RETARDANT BIN	None	None	2.5 tons/hour	N/A
12-276	V-1902	L19 V-1902 RECYCLE BIN	None	None	2.5 tons/hour	N/A
12-277	V-1904	V-1904 IMPACT MODIFIER PELLET BIN	None	None	2.5 tons/hour	N/A
12-278	V-1906	V-1906 IMPACT MODIFIER	None	None	2.5 tons/hour	N/A
12-279	K-1902A	L18&19 K-1902 A VACUUM BLOWER	None	Filter	2.5 tons/hour	N/A
12-280	K-1902B	L18&19 K-1902 B VACUUM BLOWER	None	Filter	2.5 tons/hour	N/A
12-350	L5-13	EXTRUDER FUME VENTILATION LINES 5 TO 13 NORTH	None	None	6 tons/hour	N/A
12-352	CVACB	CENTRAL VACUUM CLEANING	None	None	60 tons/hour	N/A
12-400	L5BFDC	L5, 6, 7 DUST COLLECTOR	None	Filter	1 tons/hour	N/A
12-404	L15FGPF	LINE 15 FIBERGLASS LIW FEEDER	None	None	2 tons/hour	N/A
12-405	PDL15	LINE 15 PELLET DRYER	None	None	3.5 tons/hour	N/A
12-406	PDL16	LINE 16 PELLET DRYER	None	None	3.5 tons/hour	N/A
12-409	IMP MOD DC	IMPACT MODIFIER DUST COLLECTOR	None	Filter	3.25 tons/hour	N/A
12-411	L8-13DC	L8-13 DUST COLLECTOR SYSTEM BLOWER K-002	None	Filter	1 tons/hour	N/A
12-412	SILOJ/KVB	SILO J & K DUST COLLECTOR	None	Filter	3 tons/hour	N/A
12-413	MICASILOF K	MICA SILO FLEX KLEEN	None	Filter	2 tons/hour	N/A
12-414	L5BS	LINE 5 BLENDER SURGE HOPPER	None	None	1 tons/hour	N/A
12-415	L6BSDC	L6 BLENDER SURGE HOPPER	None	None	1 tons/hour	N/A
12-416	RBCH	BAGGER-1 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-417	CFPD1F	CONAIR / FRANKLIN DRYER	None	None	0.0855 tons/hour	N/A
12-418	CFPD2F	CONAIR / FRANKLIN DRYER	None	None	0.0855 tons/hour	N/A
12-419	L16ROTO	LINE 16 ROTOCLONE	None	None	3.75 tons/hour	N/A
12-420	L17ROTO	LINE 17 ROTOCLONE	None	None	3.75 tons/hour	N/A
12-421	L5 S/U REC	LINE 5 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-422	L5 RECYC	LINE 5 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-423	L5FRCF	LINE 5 FR HOPPER	None	None	2 tons/hour	N/A
12-424	L6 REC	LINE 6 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-425	L6FRCF	LINE 6 FR HOPPER	None	None	2 tons/hour	N/A
12-426	L6 S/U REC	LINE 6 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-427	L7 S/U REC	LINE 7 STARTUP RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-428	L8 L/KM	V920 LINE 8 MISC VESSEL	None	None	2 tons/hour	N/A
12-429	L8 S/U REC	V921 LINE 8 STARTUP VESSEL	None	None	2 tons/hour	N/A
12-436	L10 FR	L10 FLAME RETARDANT BIN	None	None	2 tons/hour	N/A
12-438	L10 REC	LINE 10 RECYCLE HOPPER	None	None	2 tons/hour	N/A

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Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-439	L10 S/U	LINE 10 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-440	L11REC	LINE 11 RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-441	L11S/UREC	LINE 11 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-442	L11FR	LINE 11 FR HOPPER	None	None	2 tons/hour	N/A
12-443	L12 S/U	LINE 12 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-444	L13S/U	LINE 13 S/U RECYCLE HOPPER	None	None	2 tons/hour	N/A
12-447	L18 S/U	V-1802 LINE 18 STARTUP RECYCLE VENT	None	None	3 tons/hour	N/A
12-448	L19 S/U	V-1903 LINE 19 STARTUP RECYCLE VENT	None	None	3 tons/hour	N/A
12-449	L7APH	LINE 7A PACKING HOPPER	None	None	1.5 tons/hour	N/A
12-451	L5PH	LINE 5 PACKING HOPPER	None	None	1.5 tons/hour	N/A
12-452	L6PH	LINE 6 PACKING HOPPER	None	None	1.5 tons/hour	N/A
12-453	PROD BLEND	PK1 PRODUCT BLENDER - FOR ALL LINES	None	None	3 tons/hour	N/A
12-454	L7VB	LINE 7 V - BIN	None	None	1.5 tons/hour	N/A
12-455	PK1V507	PK1 V-507	None	None	1.5 tons/hour	N/A
12-461	B1B2LEXH	B1, B2 LEXAN# PELLET HOPPER	None	None	1.5 tons/hour	N/A
12-462	A1A2LPH	A1, A2 LEXAN# PELLET HOPPER	None	None	1.5 tons/hour	N/A
12-468	PIGROTO	PIGMENT ROOM ROTOCLONE	None	None	less than 100 lbs/hr	N/A
12-471	MISC VENT	LINE 7 ROTOCLONE EXHAUST	None	None	less than 100 lbs/hr	N/A
12-477	L6 315FK	L6 315 FLEX KLEEN	None	None	2 tons/hour	N/A
12-478	L6 195FK	L6 195 BIN EXHAUST	None	None	2 tons/hour	N/A
12-480	L7 FR	L7 FIRE RESISTANT BIN	None	None	2 tons/hour	N/A
12-481	L7RECYC	L7 RECYCLE BIN	None	None	2 tons/hour	N/A
12-482	L7 315BH	LINE 7 315 BAGHOUSE	None	Filter	2 tons/hour	N/A
12-483	L7 195BH	LINE 7 195 BAGHOUSE	None	Filter	2 tons/hour	N/A
12-484	L6-MICA	LINE 6 ROOF TOP MICA HOPPER	None	Filter	1 tons/hour	N/A
12-485	L10 195SEM	LINE 10 RESIN 195 HOPPER	None	Filter	2 tons/hour	N/A
12-486	L10 315BH	LINE 10 RESIN 315 HOPPER	None	Filter	2 tons/hour	N/A
12-488	L11 195BH	LINE 11 RESIN 195 HOPPER	None	Filter	2 tons/hour	N/A
12-489	L11 315BH	LINE 11 RESIN 315 HOPPER	None	Filter	2 tons/hour	N/A
12-490	CL4 RECYC	CL4 RECYCLE BIN	None	None	0.5 tons/hour	N/A
12-491	CL4FR	CL4 FIRE RESISTANT BIN	None	None	0.5 tons/hour	N/A
12-494	CL5-7FK195	CL 5195 FLEX KLEEN	None	None	0.5 tons/hour	N/A
12-495	CL5315FK	CL5 315 FLEX KLEEN	None	Filter	0.5 tons/hour	N/A
12-497	L17REC	LINE 17 RECYCLE	None	None	2.5 tons/hour	N/A
12-498	L17FR	L17 FIRE RESISTANT	None	None	2.5 tons/hour	N/A
12-499	PK3VACB	VACUUM BLOWER PK3 SYSTEM	None	Filter	4 tons/hour	N/A
12-500	V-300A	PACK 3 PELLET HOPPER 1	None	None	4 tons/hour	N/A
12-501	V-300B	PACK 3 PELLET HOPPER 2	None	None	4 tons/hour	N/A
12-502	V-300E	PACK 3 PELLET HOPPER 3	None	None	4 tons/hour	N/A
12-503	V-302A	PACK 3 PELLET HOPPER 4	None	None	4 tons/hour	N/A
12-504	V-302B	PACK 3 PELLET HOPPER 5	None	None	4 tons/hour	N/A
12-506	PK3 V-BIN	PACK 3 V-BIN (V-304)	None	None	4 tons/hour	N/A
12-507	L8AVB	LINE 8A V-BIN 830	None	None	2 tons/hour	N/A
12-508	L8BVB	LINE 8B V-BIN 840	None	None	2 tons/hour	N/A

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Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-509	L12VBA	LINE 12A V-BIN	None	None	1.5 tons/hour	N/A
12-510	L12VBB	LINE 12B V-BIN	None	None	1.5 tons/hour	N/A
12-511	L13VBA	LINE 13A V-BIN	None	None	1.5 tons/hour	N/A
12-512	L13VBB	LINE 13B V-BIN	None	None	1.5 tons/hour	N/A
12-515	L12 BH	LINE 12 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-516	L16ABH	LINE 16A BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-517	L13BH	LINE 13 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-518	L17ABH	LINE 17A BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-519	L15BHA	LINE 15 BAGGING HOPPER A	None	None	3.25 tons/hour	N/A
12-520	L15BHB	LINE 15 BAGGING HOPPER B	None	None	3.25 tons/hour	N/A
12-521	L18BH	LINE 18 BAGGING HOPPER	None	None	3.25 tons/hour	N/A
12-522	L17BBH	LINE 17B BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-523	L16BBH	LINE 16B BAGGING HOPPER	None	None	3.75 tons/hour	N/A
12-524	CL15-16 EF	LINE 15/16 SYSTEM/EXHAUST	None	None	0.25 tons/hour	N/A
12-526	L17-EF	LINE 17 EXHAUST FAN	None	None	0.25 tons/hour	N/A
12-533	BLS-E	BULK LOADING SILO E BIN VENT	None	None	3 tons/hour	N/A
12-534	BLS-F	BULK LOADING SILO F BIN VENT	None	None	3 tons/hour	N/A
12-535	BLS-G	BULK LOADING SILO G BIN VENT	None	None	3 tons/hour	N/A
12-536	BLS-H	BULK LOADING SILO H BIN VENT	None	None	3 tons/hour	N/A
12-537	BLSDEF-E	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-538	BLSDEF-F	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-539	BLSDEF-G	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-540	BLSDEF-H	BULK LOADING SILO DIS. EXHAUST	None	Filter	less than 100 lbs/hr	N/A
12-541	BLSW-E	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-542	BLSW-F	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-543	BLSW-G	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-544	BLSW-H	BULK LOADING SILO WEIGH HOPPER	None	None	10 tons/hour	N/A
12-545	BLSE-E	BLS LOADING EXHAUST E	None	None	10 tons/hour	N/A
12-546	BLSE-F	BLS LOADING EXHAUST F	None	None	10 tons/hour	N/A
12-547	BLSE-G	BLS LOADING EXHAUST G	None	None	10 tons/hour	N/A
12-548	BLSE-H	BLS LOADING EXHAUST H	None	None	10 tons/hour	N/A
12-564	L5RBA	LINE 5 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-565	L5RBB	LINE 5 RESIN BIN B 315	None	Filter	2 tons/hour	N/A
12-566	L7RBA	LINE 7 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-567	L7RBB	LINE 7 RESIN BIN B 315	None	Filter	2 tons/hour	N/A
12-568	V-1930	LINE 19 RESIN BIN A 195	None	Filter	2 tons/hour	N/A
12-571	V-1926	LINE 19 PACKAGING HOPPER	None	None	2 tons/hour	N/A
12-573	V-451	LINE CL2 BAGGING HOPPER	None	None	2 tons/hour	N/A
12-574	V-450	LINE CL4 BAGGING HOPPER	None	None	2 tons/hour	N/A
12-575	V-1924	LINE 19 BAGGING HOPPER A	None	None	2 tons/hour	N/A
12-576	V-1925	LINE 19 BAGGING HOPPER B	None	None	2 tons/hour	N/A
12-578	L12FR	LINE 12 FR HOPPER	None	None	0.15 tons/hour	N/A

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-580	L12RECYC	LINE 12 RECYCLE HOPPER	None	None	0.3 tons/hour	N/A
12-584	L7BLEND	LINE 7 BLENDER	None	None	0 tons/hour	N/A
12-585	L19BLEND	LINE 19 BLENDER	None	None	1.5 tons/hour	N/A
12-588	BPC	BERRINGER PARTS CLEANER - OLD	None	None	0 tons/hour	N/A
12-589	L13FR	LINE 13 FR HOPPER	None	None	1.5 tons/hour	N/A
12-590	L13REC	LINE 13 RECYCLE HOPPER	None	None	1.5 tons/hour	N/A
12-591	L13PET	LINE 13 PET HOPPER	None	None	1.5 tons/hour	N/A
12-592	L13M	LINE 13 MISC. HOPPER	None	None	1.5 tons/hour	N/A
12-593	L11VB	LINE 11 V-BIN	None	None	1.5 tons/hour	N/A
12-594	L11BH	LINE 11 BAGGING HOPPER	None	None	1.5 tons/hour	N/A
12-596	L10VB	LINE 10 V-BIN	None	None	1.5 tons/hour	N/A
12-597	L10PH	LINE 10 PACKAGING HOPPER	None	None	1.5 tons/hour	N/A
12-599	L8LPFB	L8 LEXAN# POWDER DAY BIN BAG FILTER B	None	Filter	1.5 tons/hour	N/A
12-600	L8KMV	V-1515B LINE 8 KM VESSEL	None	None	0.5 tons/hour	N/A
12-601	V-1913	V-1913 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-602	L18/19DC	LINE 18/19 DUST COLLECTOR	None	Filter	less than 100 lbs/hr	N/A
12-603	L8PH	V8-50 LINE PACK HOPPER	None	None	2 tons/hour	N/A
12-604	V-1403	V-1402 195 HOPPER (FINE GRINDS)	None	None	2 tons/hour	N/A
12-605	V-1407	V-1407 315 HOPPER (FINE GRINDS)	None	None	2 tons/hour	N/A
12-606	CL5FR	CL5 FR HOPPER	None	None	0.5 tons/hour	N/A
12-607	TMTCB	TMTC SILO B	None	Filter	4 tons/hour	N/A
12-608	V-1905	V-1905 LEXAN# POWDER BIN	None	None	1.5 tons/hour	N/A
12-610	BPC NEW	BERRINGER PARTS CLEANER - NEW	None	None	0 tons/hour	N/A
12-611	MDB K-100	METAL DETECTOR BLOWER K-100	None	Filter	6 tons/hour	N/A
12-612	MDB K-101	METAL DETECTOR BLOWER K-101	None	Filter	6 tons/hour	N/A
12-613	F30002	LINE 7 FR25 DUST COLLECTOR F30002	None	Filter	2 tons/hour	N/A
12-614	F30003	LINE 15 FR25 DUST COLLECTOR F30002	None	Filter	2 tons/hour	N/A
12-615	BAG2 BBR	BAGGER-2 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-616	BAG3 BBR	BAGGER-3 BUSTED BAG RECEIVER	None	None	0.5 tons/hour	N/A
12-617	B-5000D	215 HPR BLOWER B-5000D	None	Filter	3 tons/hour	N/A
12-618	B-30001	PET TRANSFER BLOWER B-30001	None	Filter	3 tons/hour	N/A
12-619	K-3001	OFF-LINE DEMETALIZER K-3001	None	Filter	2 tons/hour	N/A
12-620	PVCS	PACKAGING VACUUM CLEANING SYSTEM	None	None	less than 100 lbs/hr	N/A
12-621	B-0201	FR SILO VACUUM BLOWER B-0201	None	Filter	3 tons/hour	N/A
12-622	L17 LPH	LINE 17 LEX POWDER HOPPER	None	None	3 tons/hour	N/A
12-623	L16 LPFR	LINE 16 LEX POWDER FILTER RECEIVER	None	Filter	3 tons/hour	N/A
12-624	L16 LPH	LINE 16 LEX POWDER HOPPER	None	None	3 tons/hour	N/A
12-625	F3150A	F3150A FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A
12-626	F3150B	F3150B FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A

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Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices (b)	Maximum Capacity (c)	Date of Construct
12-627	F3150C	F3150C FINES DUST COLLECTOR	None	Filter	0.5 tons/hour	N/A
12-628	FH V-3000	315 FINES HOPPER V-3000	None	None	0.5 tons/hour	N/A
12-628	FH V-3002	195 FINES HOPPER V-3002	None	None	0.5 tons/hour	N/A
12-630	HB K-004	HOFFMAN BLOWER K-004	None	Filter	9 tons/hour	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

O.1.1 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the following emission units shall not exceed the calculated rates given in pounds per hour when operating at the maximum process weight rate shown in the table below. The pounds per hour limitations were calculated using the following equations:

Interpolation of the data for the process weight rate up to 60,000 pounds per hour shall be accomplished by use of the equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

Interpolation and extrapolation of the data for the process weight rate in excess of sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$E = 55.0\ P^{0.11} - 40$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
12-039	CL2RH	0.50	2.58
12-042	V-506D	2.00	6.52
12-057	V-506	2.00	6.52
12-072	SILO J	1.50	5.38
12-073	SILO K	1.50	5.38
12-137	L12RBF/A	1.20	4.63
12-138	L12RBF/B	1.20	4.63
12-142	L13RBF/A	1.20	4.63
12-143	L13RBF/B	1.20	4.63
12-145	L4CF	3.50	9.49
12-170	CSM	5.00	12.1
12-171	CSN	5.00	12.1
12-173	BCB (VLX)	5.00	12.1
12-181	CL4RBF/A	0.50	2.58
12-182	CL4RBF/B	0.50	2.58
12-185	L15RBF/A	2.50	7.58
12-186	L15RBF/B	2.50	7.58
12-188	CPC	2.50	7.58
12-189	L16RBF/A	2.50	7.58
12-190	L16RBF/B	2.50	7.58

Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
12-193	L17RBF/A	2.50	7.58
12-194	L17RBF/B	2.50	7.58
12-196	FPRCS2	9.00	17.9
12-201	L8LPSA	1.50	5.38
12-203	L8RBF/A	2.50	7.58
12-204	L8RBF/B	2.50	7.58
12-205	L8LPF	1.50	5.38
12-206	L15-17	0.35	2.03
12-207	FCDC2	1.75	5.97
12-208	BLS-A	3.00	8.56
12-209	BLS-B	3.00	8.56
12-210	BLS-C	3.00	8.56
12-211	BLS-D	3.00	8.56
12-216	BLSW-A	10.00	19.2
12-217	BLSW-B	10.00	19.2
12-218	BLSW-C	10.00	19.2
12-219	BLSW-D	10.00	19.2
12-220	BLSE-A	10.00	19.2
12-221	BLSE-B	10.00	19.2
12-222	BLSE-C	10.00	19.2
12-223	BLSE-D	10.00	19.2
12-226	L17LPRF	1.50	5.38
12-248	BLSABB	10.00	19.2
12-249	BLSBBB	10.00	19.2
12-250	RSH2	3.00	8.56
12-253	V-1620	1.00	4.10
12-254	V-1720	1.00	4.10
12-257	FPRCS1	9.00	17.9
12-258	F-1804	2.50	7.58
12-259	F-1801	2.50	7.58
12-260	F-1802	2.50	7.58
12-261	V-1808A	2.50	7.58
12-262	V-1808B	2.50	7.58
12-263	V-1806	1.50	5.38
12-264	V-1815	1.50	5.38
12-265	V-1801	1.88	6.26
12-266	V-1803	2.50	7.58
12-267	V-1807	2.50	7.58
12-268	L18E	2.50	7.58
12-268	L19E	2.50	7.58
12-269	F-1901	2.50	7.58
12-270	F-1902	2.50	7.58
12-271	V-1931	2.50	7.58
12-272	V-1932	2.50	7.58
12-273	V-1905	2.50	7.58
12-274	V-1928	2.50	7.58
12-275	V-1929	2.50	7.58
12-276	V-1902	2.50	7.58
12-277	V-1904	2.50	7.58
12-278	V-1906	2.50	7.58
12-279	K-1902A	2.50	7.58
12-280	K-1902B	2.50	7.58
12-350	L5-13	6.00	13.6
12-352	CVACB	60.0	46.3
12-400	L5BFDC	1.00	4.10
12-404	L15FGPF	2.00	6.52
12-405	PDL15	3.50	9.49
12-406	PDL16	3.50	9.49
12-409	IMP MOD DC	3.25	9.03
12-411	L8-13DC	1.00	4.10
12-412	SILOJ/KVB	3.00	8.56
12-413	MICASILOFK	2.00	6.52

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Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
12-414	L5BS	1.00	4.10
12-415	L6BSDC	1.00	4.10
12-416	RBCH	0.50	2.58
12-417	CFPD1F	0.09	0.817
12-418	CFPD2F	0.09	0.817
12-419	L16ROTO	3.75	9.94
12-420	L17ROTO	3.75	9.94
12-421	L5 S/U REC	2.00	6.52
12-422	L5 RECYC	2.00	6.52
12-423	L5FRCF	2.00	6.52
12-424	L6 REC	2.00	6.52
12-425	L6FRCF	2.00	6.52
12-426	L6 S/U REC	2.00	6.52
12-427	L7 S/U REC	2.00	6.52
12-428	L8 L/KM	2.00	6.52
12-429	L8 S/U REC	2.00	6.52
12-436	L10 FR	2.00	6.52
12-438	L10 REC	2.00	6.52
12-439	L10 S/U	2.00	6.52
12-440	L11REC	2.00	6.52
12-441	L11S/UREC	2.00	6.52
12-442	L11FR	2.00	6.52
12-443	L12 S/U	2.00	6.52
12-444	L13S/U	2.00	6.52
12-447	L18 S/U	3.00	8.56
12-448	L19 S/U	3.00	8.56
12-449	L7APH	1.50	5.38
12-451	L5PH	1.50	5.38
12-452	L6PH	1.50	5.38
12-453	PROD BLEND	3.00	8.56
12-454	L7VB	1.50	5.38
12-455	PK1V507	1.50	5.38
12-461	B1B2LEXH	1.50	5.38
12-462	A1A2LPH	1.50	5.38
12-477	L6 315FK	2.00	6.52
12-478	L6 195FK	2.00	6.52
12-480	L7 FR	2.00	6.52
12-481	L7RECYC	2.00	6.52
12-482	L7 315BH	2.00	6.52
12-483	L7 195BH	2.00	6.52
12-484	L6-MICA	1.00	4.10
12-485	L10 195SEM	2.00	6.52
12-486	L10 315BH	2.00	6.52
12-488	L11 195BH	2.00	6.52
12-489	L11 315BH	2.00	6.52
12-490	CL4 RECYC	0.50	2.58
12-491	CL4FR	0.50	2.58
12-494	CL5-7FK195	0.50	2.58
12-495	CL5315FK	0.50	2.58
12-497	L17REC	2.50	7.58
12-498	L17FR	2.50	7.58
12-499	PK3VACB	4.00	10.4
12-500	V-300A	4.00	10.4
12-501	V-300B	4.00	10.4
12-502	V-300E	4.00	10.4
12-503	V-302A	4.00	10.4
12-504	V-302B	4.00	10.4
12-506	PK3 V-BIN	4.00	10.4
12-507	L8AVB	2.00	6.52
12-508	L8BVB	2.00	6.52
12-509	L12VBA	1.50	5.38
12-510	L12VBB	1.50	5.38

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Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
12-511	L13VBA	1.50	5.38
12-512	L13VBB	1.50	5.38
12-515	L12 BH	1.50	5.38
12-516	L16ABH	3.75	9.94
12-517	L13BH	1.50	5.38
12-518	L17ABH	3.75	9.94
12-519	L15BHA	3.25	9.03
12-520	L15BHB	3.25	9.03
12-521	L18BH	3.25	9.03
12-522	L17BBH	3.75	9.94
12-523	L16BBH	3.75	9.94
12-524	CL15-16 EF	0.25	1.62
12-526	L17-EF	0.25	1.62
12-533	BLS-E	3.00	8.56
12-534	BLS-F	3.00	8.56
12-535	BLS-G	3.00	8.56
12-536	BLS-H	3.00	8.56
12-541	BLSW-E	10.00	19.2
12-542	BLSW-F	10.00	19.2
12-543	BLSW-G	10.00	19.2
12-544	BLSW-H	10.00	19.2
12-545	BLSE-E	10.00	19.2
12-546	BLSE-F	10.00	19.2
12-547	BLSE-G	10.00	19.2
12-548	BLSE-H	10.00	19.2
12-564	L5RBA	2.00	6.52
12-565	L5RBB	2.00	6.52
12-566	L7RBA	2.00	6.52
12-567	L7RBB	2.00	6.52
12-568	V-1930	2.00	6.52
12-571	V-1926	2.00	6.52
12-573	V-451	2.00	6.52
12-574	V-450	2.00	6.52
12-575	V-1924	2.00	6.52
12-576	V-1925	2.00	6.52
12-578	L12FR	0.15	1.15
12-580	L12RECYC	0.30	1.83
12-584	L7BLEND	0.00	0.00
12-585	L19BLEND	1.50	5.38
12-588	BPC	0.00	0.00
12-589	L13FR	1.50	5.38
12-590	L13REC	1.50	5.38
12-591	L13PET	1.50	5.38
12-592	L13M	1.50	5.38
12-593	L11VB	1.50	5.38
12-594	L11BH	1.50	5.38
12-596	L10VB	1.50	5.38
12-597	L10PH	1.50	5.38
12-599	L8LPFB	1.50	5.38
12-600	L8KMV	0.50	2.58
12-601	V-1913	1.50	5.38
12-603	L8PH	2.00	6.52
12-604	V-1403	2.00	6.52
12-605	V-1407	2.00	6.52
12-606	CL5FR	0.50	2.58
12-607	TMTCB	4.00	10.4
12-608	V-1905	1.50	5.38
12-611	MDB K-100	6.00	13.6
12-612	MDB K-101	6.00	13.6
12-613	F30002	2.00	6.52
12-614	F30003	2.00	6.52
12-615	BAG2 BBR	0.50	2.58

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Stack/Vent ID	Emission Unit ID	P= Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
12-616	BAG3 BBR	0.50	2.58
12-617	B-5000D	3.00	8.56
12-618	B-30001	3.00	8.56
12-619	K-3001	2.00	6.52
12-621	B-0201	3.00	8.56
12-622	L17 LPH	3.00	8.56
12-623	L16 LPFR	3.00	8.56
12-624	L16 LPH	3.00	8.56
12-625	F3150A	0.50	2.58
12-626	F3150B	0.50	2.58
12-627	F3150C	0.50	2.58
12-628	FH V-3000	0.50	2.58
12-628	FH V-3002	0.50	2.58
12-630	HB K-004	9.00	17.9

(b) Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission units L18/19DC, BLSDEF-E, BLSDEF-F, BLSDEF-G, BLSDEF-H, PIGROTO, MISC VENT, BLSDEF-A, BLSDEF-B, BLSDEF-C, BLSDEF-D, L14EFP, FRSS, and PVCS shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

O.1.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with O.1.1, the filters or rotoclones associated with facilities V-506D, F-1901, F-1804, SILO J, SILO K, L12RBF/A, L12RBF/B, L13RBF/A, L13RBF/B, L4CF, BCB (VLX), CL4RBF/A, CL4RBF/B, L15RBF/A, L15RBF/B, CPC, L16RBF/A, L16RBF/B, L17RBF/A, L17RBF/B, FRSS, FPRCS2, L14EFP, L8LPSA, L8RBF/A, L8RBF/B, L8LPF, FCDC2, BLS-A, BLS-B, BLS-C, BLS-D, BLSDEF-A, BLSDEF-B, BLSDEF-C, BLSDEF-D, L17LPRF, BLSABB, BLSBBB, FPRCS1, F-1801, F-1802, V-1815, F-1902, V-1931, V-1932, V-1905, K-1902A, K-1902B, L5BFDC, IMP MOD DC, L8-13DC, SILOJ/KVB, MICASILOFK, L7 315BH, L7 195BH, L6-MICA, L10 195SEM, L10 315BH, L11 195BH, L11 315BH, CL5315FK, PK3VACB, BLSDEF-E, BLSDEF-F, BLSDEF-G, BLSDEF-H, L5RBA, L5RBB, L7RBA, L7RBB, V-1930, L8LPFB, L18/19DC, TMTCB, MDB K-100, MDB K-101, F30002, F30003, B-5000D, B-30001, K-3001, B-0201, L16 LPFR, F3150A, F3150B, F3150C, and HB K-004 shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

O.1.3 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust from emission units CSM, CSN, BCB (VLX), FPRCS2, BLSE-A, BLSE-B, BLSE-C, BLSE-D, BLSABB, BLSBBB, FPRCS1, L5-13, CVACB, PK3VACB, V-300A, V-300B, V-300E, V-302A, V-302B, PK3 V-BIN, and TMTCB shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from CSM, CSN, BCB (VLX), FPRCS2, BLSE-A, BLSE-B, BLSE-C, BLSE-D, BLSABB, BLSBBB, FPRCS1, L5-13, CVACB, PK3VACB, V-300A, V-300B, V-300E, V-302A, V-302B, PK3 V-BIN, and TMTCB, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

O.1.4 Record Keeping Requirements

(a) To document compliance with Condition O.1.3, the Permittee shall maintain the weekly record of the visible emission notations required by Condition O.1.3(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition O.1.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Section O consists of the following Sections: O.1.

Condition O.1.4 concludes the Section O requirements of this permit

SECTION P.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: HPP Co-Polymer, Buildings 47 and 48

HPP Co-Polymer Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the affected source or affected facility subject to the applicable regulation.

(a) The HPP Co-Polymer Area includes four miscellaneous organic chemical manufacturing units (MCPU) which are part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing units are identified as HppMONCoP1, HppMONCoP2, HppMONCoP3, and HppMONCoP4. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials specified in 40 CFR 63.2435(b)(1). MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to HppMONCoP1, HppMONCoP2, HppMONCoP3, and HppMONCoP4 are specified in Section N of this permit.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

P.1.1 National Emissions Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing [40 CFR Part 63, Subpart FFFF]

The requirements of 40 CFR Part 63, Subpart FFFF specified in Section N.1 of this permit apply to the miscellaneous organic chemical manufacturing units identified as HppMONCoP1, HppMONCoP2, HppMONCoP3, and HppMONCoP4.

SECTION P.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: HPP Co-Polymer, Buildings 47 and 48

HPP Co-Polymer Operations

(b) The HPP Co-Polymer operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-103	AVB	AUTOMATIQUE VACUUM BLOWER	None	None	1.0 tons/hour	1989
47A-001	10 CVR	10 CV REACTOR	WSC**	10 CV Condenser	N/A	1991
47A-001	40 CV FP	40 CV FREEZE POT	WSC**	40 CV Freeze Pot; 40 CV Condenser	N/A	1991
47A-002	HOT OIL	HOT OIL EXPANSION TANK	None	None	N/A	1991

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
13-001	V-221	REFRIGERATED CONDENSER*	None	None	N/A	N/A
13-004	J-302	VACUUM JET J-302 VENT - REFRIGERATED CONDENSER*	None	None	N/A	N/A
13-005	J-501	REFRIGERATED CONDENSER (WITH CARBON ADSORBER)*	None	None	N/A	N/A
13-005	J-502	REFRIGERATED CONDENSER (WITH CARBON ADSORBER)*	None	None	N/A	N/A
13-006	V-715	HOT OIL EXPANSION TANK VENTS	None	None	less than 40 m^3	N/A
13-008	A-208	BPA-DA BAG DUMP	None	None	less than 100 lb/hr	N/A
13-010	A-311	BPA-DA BAG DUMP	None	None	less than 100 lb/hr	N/A
13-015	A-713	FUGITIVE DUST COLLECTOR	None	Filter	less than 100 lb/hr	N/A
13-027	V-514	HOTWELL (V514) VENT	None	None	less than 40 m^3	N/A
13-092	V-717	HOT OIL EXPANSION TANK	None	None	less than 40 m^3	N/A
13-169	V-4008A	MOLTON POLYMER HANDLING SYSTEM	None	None	N/A	N/A
13-250	PEWSCD	PROCESSING EQUIPMENT (WITH WATER SRUBBER AND CARBON DRUM)*	None	None	0.30 tons/hour	N/A
13-257	BF-X511	PELLETIZER RECOVERY FILTER	None	Filter	0.15 tons/hour	N/A
13-258	V-6009	MPD STORAGE TANK, V4008C	None	None	less than 40 m^3	N/A
13-259	DCS BLDG48	CENTRAL DUST COLLECTOR SYSTEM	None	Filter	less than 100 lb/hr	N/A
13-274	UTC CTC1	ULTEM# CO-POLYMER COOLING TOWER CELL 1	None	None	N/A	N/A
13-275	UTC CTC2	ULTEM# CO-POLYMER COOLING TOWER CELL 2	None	None	N/A	N/A

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13-276	X-560B	VACUUM PUMP	None	None	N/A	N/A
13-362	DDDC	BPA-DA DRUMMING DUST COLLECTOR	None	Filter	less than 100 lb/hr	N/A
47A-003	DIS-8CV	DISENTRAINMENT 8CV	Carbon Canister***	8 CV Freeze Pot; 8 CV Condenser	N/A	1991

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The amount of VOC entering each of these control devices is 2.6 lb/hr VOC or less; this amount of VOC would not trigger an air regulatory requirement to install a control device. The source has installed this equipment to reduce emissions that would otherwise not require control.
** The amount of VOC entering WSC is less than 5 tons/yr; this amount of VOC would not trigger an air regulatory requirement to install a control device; however, a water scrubber (WSC) controls emissions from 10CVR and 40 CV FP to reduce emissions that would otherwise not require control.
*** The amount of VOC entering the carbon canister is less than 0.1 tons/yr; this amount of VOC would not trigger an air regulatory requirement to install a control device.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

P.2.1 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
13-103	AVB	1.0	4.10
13-250	PEWSCD	0.30	1.83
13-257	BF-X511	0.15	1.15

(b) Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from A-208, A-311, A-713, DCS BLDG48, and DDDC, shall not exceed 0.551 pounds per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

P.2.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with P.2.1, the filters associated with emission units A-713, BF-X511, DCS BLDG48, and DDDC shall be in operation at all times that material is being transferred into the facility.

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

Section P consists of the following Sections: P.1, and P.2.

Condition P.2.2 concludes the Section P requirements of this permit

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

SECTION Q.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: HPP ChemOps, Buildings 58 and 59

HPP ChemOps Affected Facilities/Sources

This section lists the provisions of applicable National Emission Standards for Hazardous Air Pollutants (NESHAPS) and New Source Performance Standards (NSPS) that apply to the Permittee independent of the applicability of specific provisions to individual equipment or emission units. These provisions apply to the affected source or affected facility subject to the applicable regulation.

(a) [Reserved[

(b) The HPP ChemOps Area includes two miscellaneous organic chemical manufacturing units (MCPU) which are part of the affected source Plant-MON subject to 40 CFR 63, Subpart FFFF. The miscellaneous organic chemical manufacturing units are identified as HppMONMon1 and HppMONPol1. The affected source subject to 40 CFR 63, Subpart FFFF is the facility wide collection of MCPU and heat exchange systems, wastewater, and waste management units that are associated with manufacturing materials in 40 CFR 63.2435(b)(1). MCPUs subject to 40 CFR 63, Subpart FFFF are categorized in Section N of this permit. The general conditions of 40 CFR 63, Subpart FFFF which are applicable to HppMONMon1 and HppMONPol1 are specified in Section N of this permit.

(c) H-1100, located in the HPP ChemOps area, is classified as a commercial and industrial solid waste incineration unit (CISWI). This unit is subject to applicable requirements in 326 IAC 11-8, which incorporates specific provisions of 40 CFR 60, Subpart DDDD. The boundaries of the H-1100 CISWI unit are defined as, but not limited to, the commercial or industrial solid waste fuel feed system, grate system, flue gas system, and bottom ash. H-1100 does not include air pollution control equipment or the stack. Upon reconstruction the H-1100 CISWI unit would no longer be subject to requirements in 326 IAC 11-8 and would become an affected facility subject to 40 CFR 60, Subpart CCCC requirements.

(d) The affected facilities subject to 40 CFR 60, Subpart Dc are identified as H-900 and H-900B. The affected facility is each steam generating unit for which construction, modification, or reconstruction is commenced after June 9, 1989 and that has a maximum design heat input capacity of 29 megawatts (MW) (100 million Btu per hour (Btu/hr)) or less, but greater than or equal to 2.9 MW (10 million Btu/hr).

The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

Q.1.1 [Reserved]

Q.1.2 National Emissions Standards for Hazardous Air Pollutants for Miscellaneous Organic Chemical Manufacturing [40 CFR Part 63, Subpart FFFF]

The requirements of 40 CFR Part 63, Subpart FFFF specified in Section N.1 of this permit apply to the miscellaneous organic chemical manufacturing units identified as HppMONMon1 and HppMONPol1.

Q.1.3 Commercial and Industrial Solid Waste Incineration (CISWI) [326 IAC 11-8; 326 IAC 12] [40 CFR 60, Subpart CCCC]

As of August 7, 2002, H-1100 has been subject to 40 CFR 60, Subpart DDDD, as incorporated by 326 IAC 11-8 and as specified in Conditions Q.2.3, Q.2.15, and Q.2.21(b) of this permit. If a

change is made to H-1100 that meets the definition of a modification or reconstruction, as defined in 40 CFR 60.2875, then the Permittee shall comply with the applicable requirements of 40 CFR 60, Subpart CCCC and 326 IAC 12 instead of the requirements of 40 CFR 60, Subpart DDDD, as incorporated by 326 IAC 11-8.

Q.1.4 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

If the Permittee is required to comply with the applicable requirements of 40 CFR 60, Subpart CCCC pursuant to 326 IAC 12, as set forth in Condition Q.1.3, then the table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility H-1100.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description
60.11(a)	Compliance with standards and maintenance requirements
60.11(b)	Compliance with standards and maintenance requirements
60.11(c)	Compliance with standards and maintenance requirements
60.11(d)	Compliance with standards and maintenance requirements
60.11(e)	Compliance with standards and maintenance requirements
60.11(f)	Compliance with standards and maintenance requirements
60.11(g)	Compliance with standards and maintenance requirements
60.13(a)	Monitoring requirements
60.13(b)	Monitoring requirements
60.13(c)	Monitoring requirements
60.13(d)	Monitoring requirements
60.13(e)	Monitoring requirements
60.13(f)	Monitoring requirements
60.13(h)	Monitoring requirements

Q.1.5 [Reserved]

Compliance Determination Requirements

Q.1.6 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

If the Permittee is required to comply with the applicable requirements of 40 CFR 60, Subpart CCCC pursuant to 326 IAC 12, as set forth in Condition Q.1.3, then the table that follows provides performance testing requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility H-1100.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description
60.8(a)	Performance tests
60.8(b)	Performance tests
60.8(c)	Performance tests

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description
60.8(d)	Performance tests
60.8(e)	Performance tests
60.8(f)	Performance tests

Q.1.7 [Reserved]

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

Q.1.8 Record Keeping and Reporting Requirements

(a) If the Permittee is required to comply with the applicable requirements of 40 CFR 60, Subpart CCCC pursuant to 326 IAC 12, as set forth in Condition Q.1.3, then the table that follows provides recordkeeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the affected facility H-1100.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description
60.7(a)	Notification and record keeping
60.7(b)	Notification and record keeping
60.7(c)	Notification and record keeping
60.7(d)	Notification and record keeping
60.7(e)	Notification and record keeping
60.7(f)	Notification and record keeping
60.7(g)	Notification and record keeping
60.7(h)	Notification and record keeping

(b) The table that follows provides recordkeeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, which are incorporated by reference in 326 IAC 12-1, that apply to the Natural gas-fired Hot Oil Heaters identified as H-900 and H-900B.

Applicable 40 CFR Part 60, Subpart A Requirement	Regulatory Citation Description
60.7(a)	Notification and record keeping
60.7(b)	Notification and record keeping

(c) [Reserved]

(d) All records required to be maintained by Condition Q.1.8 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) The Permittee shall submit the reports and records required to be submitted by Condition Q.1.8 to the address listed in Section C - General Reporting Requirements, of this permit.

SECTION Q.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: HPP ChemOps, Buildings 58 and 59

HPP ChemOps Operations

(e) The HPP ChemOps operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-042	V-500A[f]	DA HOLD TANK	None	None	57.5 m^3	1985
13-042	V-500B[f]	DA HOLD TANK	None	None	57.5 m^3	1985
13-042	C1011	TT-604, C1011 VENT HEADER	None	None	N/A	N/A
13-044	V-700	MT-701, V-700 STORAGE TANK	None	None	57.0 m^3	1985
13-048	V-970	V-970 CONCENTRATED WASTE TANK	Condenser C971	None	79.2 m^3	1985
13-049	H-900	HOT OIL BURNER H900	None	None	28.8 mmBtu/hr	N/A
13-054	V-753	PROCESS TANK	Condenser	None	N/A	N/A
13-056	S-800	JC-803, S-800 TOLUENE SUMP	Condenser C801	None	N/A	N/A
13-057	V-830[f]	WASTEWATER SURGE TANK	None	None	67 m^3	1985
13-057	C-861	V840 DRUM VENT	None	None	N/A	N/A
13-058	V-904	V904 HOT OIL STORAGE	None	None	90.6 m^3	1985
13-059	V-903	V903 HOT OIL EXPANSION	None	None	N/A	N/A
13-062	PI/MMA HD	HC-612A&B SWITCH CONDENSERS	Scrubber PI/MMA HD	None	N/A	N/A
13-098	H-1100	THERMAL OXIDIZER	Integrated Abatement System[h]	None	16.3 mmBtu/hr	N/A
13-155	SC-1/2	NO_X CONTAINMENT SYSTEM	None	None	N/A	N/A
13-172	MS-361	PI STORAGE	None	None	N/A	N/A
13-279	V-790	STORAGE TANK	None	None	N/A	N/A
13-290	S-800B	TOLUENE WASTEWATER TANK	None	None	N/A	N/A
13-321	H-900B	NEW HOT OIL BURNER	None	None	31.9 mmBtu/hr	N/A
13-322	V-903B	NEW HOT OIL EXPANSION DRUM	None	None	N/A	N/A
13-323	V-904B	NEW HOT OIL STORAGE TANK	None	None	93.1 m^3	2000
13-346	C-1001[e]	VENT CONDENSER	H-2100 Oxidizer	None	N/A	N/A
13-346	C-1021[e]	VENT CONDENSER	H-2100 Oxidizer	None	N/A	N/A
13-346	S-801[e]	LIFT STATION	H-2100 Oxidizer	None	N/A	N/A

13-346	T-105[e]	WASTEWATER STRIPPER	H-2100 Oxidizer	None	N/A	N/A
13-346	V-250[f]	BI SURGE TANK	None	None	64 m^3	1985
13-346	V-240[f]	BI WATER-WASH TANK	None	None	55 m^3	1985
13-346	V-130[f]	NPI SURGE TANK	None	None	61.7 m^3	1985
13-346	V-223[f]	TOLUENE/WATER DECATNER	None	None	57.8 m^3	1985
13-346	V-273[f]	DRY TOLUENE SURGE TANK	None	None	40.1 m^3	1985
13-347	C-1001[e]	VENT CONDENSER (AOS)	None	None	N/A	N/A
13-347	C-1021[e]	VENT CONDENSER (AOS)	None	None	N/A	N/A
13-347	S-801[e]	LIFT STATION (AOS)	None	None	N/A	N/A
13-347	T-105[e]	WASTEWATER STRIPPER (AOS)	None	None	N/A	N/A
13-365	V-750B	CONTAMINATED TOLUENE TANK	Condenser C751B	None	89.0 m^3	2005

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
13-045	V-710	MPD STORAGE TANK	None	None	N/A	N/A
13-046	V-730	ODCB TANK	None	None	76.3 m^3	1985
13-050	F-785	BPA SILO VENT FILTER	None	Filter	4.96 tons/hr	N/A
13-055	S-810	JC-802, S810 SUMP	None	None	N/A	N/A
13-060	V-965	V965 REFRIGERANT EXPANSION TANK	None	None	N/A	N/A
13-061	V-905	MS-911 TEMPERED OIL EXPANSION TANK, V-905	None	None	N/A	N/A
13-063	V-740[f]	MMA STORAGE TANK	None	None	44.4 m^3	1985
13-063	T-744	AS701 VENT SCRUBBER T744[g]	None	None	N/A	N/A
13-064	D-390	FLAKER DUST COLLECTOR	None	Filter	1.0 tons/hr	N/A
13-075	W-515	DI-AMINE WEIGHT TANK	None	None	N/A	N/A
13-148	541-T	541-T RAT TANK	None	None	N/A	N/A
13-150	571-T	STORAGE TANK (86%)	None	None	N/A	N/A
13-170	BSST	BULK SALT STORAGE TANK	None	Filter	24.96 tons/hr	N/A
13-261	V-900	INCINERATOR WASTE STOR TANK	None	None	N/A	N/A
13-262	V-79T	CLOTH WASH	None	None	N/A	N/A
13-263	BF-R230MD	MANUAL DUMPER BAG FILTER	None	Filter	N/A	N/A
13-265	V-570A	PRODUCT VERIFICATION BIN	None	None	2.25 tons/hr	N/A
13-266	V-570B	PRODUCT VERIFICATION BIN	None	None	2.25 tons/hr	N/A
13-267	X-560	PELLET TRANSFER SYSTEM	None	None	2.25 tons/hr	N/A
13-270	UMDGFT	HPP MONOMER DIESEL GENERATOR TANK	None	None	N/A	N/A
13-272	ULC CTC1	HPP CHEM-OPS COOLING TOWER CELL 1	None	None	N/A	N/A
13-273	ULC CTC2	HPP CHEM-OPS COOLING TOWER CELL 2	None	None	N/A	N/A
13-278	F400V	F400 SYSTEM VENTILATION	None	None	N/A	N/A
13-284	S-810B	ODCB WASTEWATER TANK	None	None	N/A	N/A

13-319	CTCC3	COOLING TOWER CELL C3	None	None	N/A	N/A
13-320	CTCC4	COOLING TOWER CELL C4	None	None	N/A	N/A
13-340	PABDS	PA BAG DUMP STATION	None	None	Less Than 0.05 tons/hr	N/A
13-341	F-205B	BPA SURGE BIN VENT FILTER	None	Filter	3.6 tons/hr	N/A
13-342	MBLV	MAINTENANCE BLDG LOCAL VENT	None	None	N/A	N/A
13-343	MBRV	MAINTENANCE BLDG ROOF VENT	None	None	N/A	N/A
13-354	102-T/B	JACK TANK #3	None	None	N/A	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))
e. The Permittee has the option to vent emission units C-1001, C-1021, S-801, and T-105 to the oxidizer H-2100 or to the atmosphere.
f. Tanks V-500A and V-500B are part of emission unit C1011. Tanks V-273, V-250, V-240, V-130, and V-223 are part of emission unit C-1001. Tank V-830 is part of emission unit C-861. Tank V-740 is part of emission unit T-744.
g. T744 is a safety system integral to process operations and is not considered a control or recovery device.
h. H-1100 is controlled by an integrated abatement system that includes a quench tank, a quench water receiver, wet scrubbing components, and filter cartridges contained in mist eliminators.

Notes: The detailed calculations including emission factor information of the emission units included in this Section Q is treated as confidential information.

For purposes of this permit section, the pounds of steam usage and the fugitive VOC emissions which are both associated with this HPP operation are termed HppSTEAM and FUG, respectively.

Weight hopper recovery filter, identified as F-205; PA/MPD melter and charge tank, identified as V-1565B; separator, identified as KO-500; cloth wash section tank #2, identified as T-79B; and final wash receiver #2, identified as T-70B are considered trivial activities (326 IAC 2-7-1(40)) and were authorized to be built under CP-129-10588-00002, issued on August 24, 1999, but may not have been built. The V-1050 scrubber identified as V-1550 is considered inoperable. The jack tank 1, identified as 100-T, is operable and is routed to the NOx containment system, identified as SC-1/2. The jack tank 2, identified as 102-T; and the final wash receiver, identified as T-70 are considered operable and have been rerouted to the NOx containment system, identified as SC-1/2.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emissions Limitation and Standards [326 IAC 2-7-5(1)]

Q.2.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

(a) Pursuant to CP-129-10588-00002, Condition D.1.1(a), issued on August 24, 1999, the pounds of ULTEM# resin produced per day; water outlet temperatures; natural gas usages; pounds of waste feed usage per day; pounds of steam usage (identified as HppSTEAM), scrubbant flow rate; number of vacuum systems associated with C-1021; and hours of bypass operation of the Vent Oxidizer H-2100 shall be limited such that the total amount of VOC emissions from C-1011, V-700, V-710, F-785, F-205, V-753, C-861, W-515, MS-361, V-1550, V-1565B, V-790, F-205B, V-750B (C751B), C-971, S-800, PI/MMA HD, V-730, V-904, V-903, T-744, 100-T, 102-T, T-70, SC-1/2, V-79T, F400V, KO-500, V-903B, V-904B, T-79B, T-102B, T-70B, H-900, H-1100, H-900B, C-1001, C-1021, S-801, and T-105, calculated using the equations contained in Condition Q.2.13(a)(1) through (a)(8), does not exceed 195.93 tons per 365-day period, rolled on a daily basis. This limit includes fugitive VOC emissions (FUG) that are associated with the HPP process and VOC emissions that are associated with production of steam (HppSTEAM) used in producing ULTEM# resin.

(b) Pursuant to CP-129-10588-00002, Condition D.1.1(b), issued on August 24, 1999, the pounds of ULTEM# resin produced per day; water outlet temperatures; hours of bypass operation of the Vent Oxidizer H-2100; number of vacuum systems associated with C-1021; and natural gas usages, shall be limited such that the total amount of VOC emissions from C-1011, V-700, V-710, V-750B (C751B), V-971, V-730, H-900, C-1001, C-1021, S-801, and T-105, calculated using the equations contained in Condition Q.2.13(b)(1) through (b)(5), does not exceed 39.49 tons per 365-day period, rolled on daily basis.

(c) Pursuant to CP-129-10588-00002, Condition D.1.4, issued on August 24, 1999, as revised through the Title V permit, the NO_x emissions from the Hot Oil Heater H-900; Hot Oil Heater H-900B; NO_x Containment SC-1/2; Thermal Oxidizer H-1100; Steam Usage identified as HppSTEAM; and the Vent Oxidizer H-2100 shall be limited such that the total amount of NO_x emissions calculated using the equations contained in Condition Q.2.14(a)(1) through (a)(4), does not exceed 133.77 tons per 365-day period, rolled on daily basis.

Compliance with the requirements in Condition Q.2.1 will make 326 IAC 2-2, the Prevention of Significant Deterioration (PSD) requirements not applicable.

Q.2.2 Volatile Organic Compounds (VOC) [326 IAC 8-1-6]

Pursuant to 326 IAC 8-1-6 and CP-129-10588-00002, Condition D.1.1(c), issued on August 23, 1999, reduction of VOC emissions from the Displacement Vent Condenser (C-1001), Exchange Vent Condenser (C1021), Lift Station (S-801), and the Wastewater Stripper (T-105) by complying with VOC limitations in Conditions Q.2.1(a) and (b), satisfies the requirements under 326 IAC 8-1-6 (General Reduction) for best available control technology (BACT).

Q.2.3 Commercial and Industrial Solid Waste Incineration (CISWI) [326 IAC 11-8]

(a) Pursuant to 326 IAC 11-8, which incorporates specific provisions set forth in the Emissions Guidelines and Compliance Times for Commercial and Industrial Solid Waste Incineration Units that Commenced Construction On or Before November 30, 1999 [40 CFR 60, Subpart DDDD], the Permittee shall meet the emission limitations specified in Table 2 of 40 CFR 60, Subpart DDDD for the incinerator identified as H-1100. The table that follows provides the specific applicable 40 CFR Part 60, Subpart DDDD standards and monitoring provisions that apply to H-1100 and the condition number where descriptions of the provisions can be found in Section NN.

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.1(b)	60.2575(b)	What are my requirements for meeting increments of progress and achieving final compliance?
NN.2	60.2580	When must I complete each increment of progress?
NN.3	60.2610	What must I do if I close my CISWI and then restart it?
NN.10	60.2670	What emission limitations must I meet and by when?
NN.11(b)	60.2675(b)	What operating limits must I meet and by when?
NN.12(a)	60.2685(a)	What happens during periods of startup, shutdown, and malfunction?

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.12(b)	60.2685(b)	What happens during periods of startup, shutdown, and malfunction?

(b) Pursuant to 326 IAC 11-8, which incorporates provisions set forth in 40 CFR 60.2635, H-1100 cannot be operated unless a fully trained and qualified CISWI unit operator is accessible, either at the facility or can be at the facility within 1 hour. The trained and qualified CISWI unit operator may operate H-1100 directly or be the direct supervisor of one or more other plant personnel who operate the unit. If all qualified CISWI unit operators are temporarily not accessible, the Permittee must follow the procedures in 40 CFR 60.2665. The table that follows provides the specific applicable 40 CFR Part 60, Subpart DDDD operator training and qualification provisions that apply to the H-1100 and the condition number where descriptions of the provisions can be found in Section NN.

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.4(a)	60.2635(a)	What are the operator training and qualification requirements?
NN.4(b)	60.2635(b)	What are the operator training and qualification requirements?
NN.4(c)	60.2635(c)	What are the operator training and qualification requirements?
NN.5	60.2640	When must the operator training course be completed?
NN.6(a)	60.2645(a)	How do I obtain my operator qualification?
NN.6(b)	60.2645(b)	How do I obtain my operator qualification?
NN.7	60.2650	How do I maintain my operator qualification?
NN.8	60.2655	How do I renew my lapsed operator qualification?
NN.9(b)	60.2660(b)	What site-specific documentation is required?

Q.2.4 [Reserved]

Q.2.5 Particulate Emissions Limit (Indirect Heating Facilities) [326 IAC 6-2]

Pursuant to 326 IAC 6-2-4 the Particulate Matter emissions from the two (2) indirect heating facilities identified as H-900 and H-900B shall be limited to 0.16 lb/mmBtu and 0.15 lb/mmBtu, respectively. This limitation was calculated using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

where Q = 1525.6 MMBtu/hr for H-900 and 2332.4 MMBtu/hr for H-900B

Q.2.6 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
13-050	F-785	4.96	12.0
13-064	D-390	1.00	4.10
13-170	BSST	24.96	35.4
13-265	V-570A	2.25	7.06
13-266	V-570B	2.25	7.06
13-267	X-560	2.25	7.06
13-341	F-205B	3.6	9.67

(b) Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission unit PABDS shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour.

Q.2.7 Liquid Waste Thermal Incinerator H-1100 Requirements [326 IAC 4-2-2]

Pursuant to 326 IAC 4-2, the incinerator shall:

(a) Consist of primary and secondary chambers or the equivalent;

(b) Be equipped with a primary burner unless burning wood products;

(c) Comply with 326 IAC 5-1 and 326 IAC 2;

(d) Be maintained, operated, and burn waste in accordance with the manufacturer's specifications or an operation and maintenance plan as specified in 326 IAC 4-2-2(c); and

(e) Not emit particulate matter in excess of Three-tenths (0.3) pounds of particulate matter per one thousand (1,000) pounds of dry exhaust gas under standard conditions corrected to fifty percent (50%) excess air.

(f) If any of the requirements of Q.2.6(a) through (e) are not met, the Permittee shall stop charging the incinerator until adjustments are made that address the underlying cause of the deviation.

The owner or operator of the incinerator must make the manufacturer's specifications or the operation and maintenance plan available within a reasonable time to the department upon request.

Compliance Determination Requirements

Q.2.8 Vent Oxidizer H-2100 [326 IAC 8-1-6][326 IAC 2-2]

The Vent Oxidizer H-2100 shall operate when the Displacement Vent Condenser C-1001, Exchange Vent Condenser C-1021, Lift Station S-801, or the Water Stripper T-105 is in operation as necessary to comply with Conditions Q.2.1(a), Q.2.1(b), and Q.2.2.

Q.2.9 Thermal Oxidizer H-1100 [326 IAC 2-2]

In order to comply with Condition Q.2.1(a) and Q.2.1(c), the Permittee shall only burn process liquid organic waste generated from Building 58 and 59 in the Thermal Oxidizer H-1100.

Q.2.10 Continuous Emissions Monitoring [326 IAC 3-5] [326 IAC 2-2]

In order to demonstrate compliance with Condition Q.2.1(c), the Permittee shall:

(a) Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions), calibrate, maintain, and operate a continuous monitoring system which meets the performance specifications of 326 IAC 3-5-2 for the following emission units:

(1) NO_x Containment System, SC-1/2 vent (SV13-155);

(2) Thermal Oxidizer, H-1100 (SV13-098); and

(3) NE BOILER (SV01-101); H BOILER (SV01-100); and BW-GAS BOILER (SV01-014) described in Section D. The continuous emissions monitoring for NE BOILER, H BOILER, and BW-GAS BOILER also demonstrates compliance with Conditions D.2.1 and D.2.2 as specified in Condition D.2.5.

(b) Install, calibrate, maintain, and operate a stack gas flowmeter on the NO_x Containment System, SC-1/2 vent SV13-155; and on the Thermal Oxidizer, H-1100 (SV13-098).

Q.2.11 Operating Parameters

To determine compliance with Condition Q.2.1(a) and/or Q.2.1(b), the following control units shall be monitored as detailed below:

Stack/Vent	Emission Unit	Control Unit	Operating Parameters
13-365	V-750B	Condenser C751B	Tempered water outlet temperature will be monitored at least once every 15 minutes when the emission unit is in operation and VOC emissions calculated pursuant to Conditions Q.2.12(a) and Q.2.12(b).
13-048	V-970	Condenser C971	Tempered water outlet temperature will be monitored at least once every 15 minutes when the emission unit is in operation and VOC emissions calculated pursuant to Condition Q.2.12(a).
13-056	S-800	Condenser C801	Tempered water outlet temperature will be monitored at least once every 15 minutes when the emission unit is in operation and VOC emissions calculated pursuant to Condition Q.2.12(a).
13-062	PI/MMA HD	Scrubber	Scrubbant water flow rate (gpm) will be monitored at least once every 15 minutes when the emission unit is in operation and VOC emissions calculated pursuant to Condition Q.2.12(a).

Q.2.12 Performance Testing [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

In order to determine compliance with Condition Q.2.1, the Permittee shall:

(a) Within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002, perform VOC testing on V-750B to verify the emission factors and constants used in Condition Q.2.13 using methods as approved by the Commissioner.

(b) Within one hundred and eighty (180) days after the issuance of this Part 70 permit T129-6794-00002, perform VOC and NO_x testing on H-2100, V-970, S-800, and PI/MMA HD to verify the applicable emission factors and constants used in Conditions Q.2.13 and Q.2.14 using methods approved by the Commissioner.

(c) By the later date of February 27, 2006, or within 90 days after restarting the commercial and industrial solid waste incineration (CISWI) unit identified as H-1100, perform VOC and NO_x testing on H-1100 using methods as approved by the Commissioner.

These tests shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration. Testing shall be conducted in accordance with Section C - Performance Testing.

Q.2.13 VOC Emissions

(a) For purposes of determining compliance with Condition Q.2.1(a), the daily VOC emissions shall be calculated as the sum of the daily emissions calculated by equations (1) through (8) as follows:

(1) The daily VOC emissions from each of the 14 following emissions units (C-1011, SV13-042; V-700, SV13-044; V-710, SV13-045; F-785, SV13-050; F-205, SV13-051; V-753, SV13-054; C-861, SV13-057; W-515, SV13-075; MS-361, SV13-172; V-1550, SV13-283; V-1565B, SV13-285; V-790, SV13-279; F-205B, SV13-341; and FUG, SV13-FUG) are based on the following equation:

VOC Emissions = (lb. ULTEM# resin produced/day) x emission factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day).

(2) The daily VOC emissions from each of the following 2 emissions units (V-750B (C751B), SV13-365; and V-970, SV13-048) are based on the following equation:
VOC Emissions = constant x (lb. ULTEM# resin produced/day) x e exp(constant x water outlet temperature (degrees Celsius)).

(3) The daily VOC emissions from the following emissions unit (S-800, SV13-056) are based on the following equation:

VOC Emissions = constant x e exp(constant x water outlet temperature (degrees Celsius)).

(4) The daily VOC emissions from the following emissions unit (PI/MMA HD, SV13-062) are based on the following equation:

VOC Emissions = constant x e exp(constant/(scrubbant flow rate (lb/hr)) exp(constant)).

(5) The daily VOC emissions from each of the 16 following emissions units (V-730, SV13-046; V-904, SV13-058; V-903, SV13-059; T-744, SV13-063; 100-T, 13-360 (formerly SV13-141A); 102-T, SV13-361 (formerly SV13-141B); T-70, SV13-152; SC-1/2, SV13-155; V-79T, SV13-262; F400V, SV13-278; KO-500, SV13-317; V-903B, SV13-322; V-904B, SV13-323; T-79B, SV13-353; T-102B, SV13-354; T-70B, SV13-356) are based on the following equation:

VOC Emissions = constant (lb. VOC/day).

(6) The daily VOC emissions from each of the 3 following emissions units (H-900, SV13-049; H-1100, SV13-098; and H-900B, SV13-321) are based on the following equation:

VOC Emissions = (scf natural gas used/day) x emissions factor (lb. VOC/scf natural gas) + [for H-1100 only] (pounds of waste feed/day) x emissions factor (lb. VOC/lb. waste).

(7) The daily VOC emissions from the steam usage at the ULTEM# resin operation (HppSTEAM) are based on the following equation:

VOC Emissions = (lb. steam usage at ULTEM# resin operation/day) x emissions factor (lb. VOC/lb. steam usage) + constant (lb. VOC/day).

(8) Whenever the Displacement Vent Condenser C-1001, Exchange Vent Condenser C-1021, Lift Station S-801, or the Water Stripper T-105 is vented to both the atmosphere and the Vent Oxidizer H-2100 during the day, the Permittee shall sum the VOC emitted during such day as follows:

VOC Emissions = [[[(lb. ULTEM# resin produced/day) x SV13-346 emissions factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day)] + (constant (lb VOC/day) x (number of vacuum systems associated with C-1021)) - constant (lb VOC/day)] x (hours/day flow vented to SV13-346) x (1 day/24 hours)] + [[[(lb. ULTEM# resin produced/day) x SV13-347 emissions factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day)] + (constant (lb VOC/day) x (number of vacuum systems associated with C-1021)) - constant (lb VOC/day)] x (hours/day flow vented to SV13-347) x (1 day/24 hours)] + [for SV13-346 only] (scf natural gas used/day) x emission factor (lb. VOC/scf natural gas). The emission factor for SV13-346 is assumed to be 0.05 times the emission factor for SV13-347, reflecting an overall control efficiency of 95%. Performance testing conducted as required by this permit will establish the actual destruction efficiency that should be used when calculating the emission factor for SV13-346.

(b) For purposes of determining compliance with Condition Q.2.1(b), the daily VOC emissions shall be calculated as the sum of the following:

(1) The daily VOC emissions from each of the 3 following emissions units (C-1011, SV13-042; V-700, SV13-044; V-710, SV13-045) are based on the following equation:

VOC Emissions = (lb. ULTEM# resin produced/day) x emission factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day).

(2) The daily VOC emissions from the 2 following emissions units (V-750B (C751B), SV13-365; V-970(C-971), SV13-048) are based on the following equation:

VOC Emissions = constant x (lb. ULTEM# resin produced/day) x e exp(constant x water outlet temperature (degrees Celsius)).

(3) The daily VOC emissions from the following emissions unit (V-730, SV13-046) are based on the following equation:

VOC Emissions = constant (lb. VOC/day).

(4) The daily VOC emissions from the following emissions unit (H-900, SV13-049) are based on the following equation:

VOC Emissions = (scf natural gas used/day) x emissions factor (lb. VOC/scf natural gas).

(5) Whenever the Displacement Vent Condenser C-1001, Exchange Vent Condenser C-1021, Lift Station S-801, or the Water Stripper T-105 is vented to both the atmosphere and the Vent Oxidizer H-2100 during the day, the Permittee shall sum the VOC emitted during such day as follows:

VOC Emissions = [[[(lb. ULTEM# resin produced/day) x SV13-346 emissions factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day)] + (constant (lb VOC/day) x (number of vacuum systems associated with C-1021)) - constant (lb VOC/day)] x (hours/day flow vented to SV13-346) x (1 day/24 hours)] +[[[(lb. ULTEM# resin produced/day) x SV13-347 alternate emissions factor (lb. VOC/lb. ULTEM# resin produced) + constant (lb. VOC/day)] + (constant (lb VOC/day) x (number of vacuum systems associated with C-1021)) - constant (lb VOC/day)] x (hours/day flow vented to SV13-347) x (1 day/24 hours)]. The emission factor for SV13-346 is assumed to be 0.05 times the emission factor for SV13-347, reflecting an overall control efficiency of 95%. Performance testing conducted as required by this permit will establish the actual destruction efficiency that should be used when calculating the emission factor for SV13-346.

Q.2.14 Nitrogen Oxides (NO_x)

(a) For purposes of determining compliance with Condition Q.2.1(c), the daily NO_x emissions shall be calculated as the sum of the daily emissions calculated using the equations in paragraphs (a)(1) through (4) as follows:

(1) The daily NO_x emissions from each of the two following emissions units (H-900, SV13-049; and H-900B, SV13-321) are based on the following equation:

NO_x Emissions = (scf natural gas used/day) x emissions factor (lb. NO_x /scf natural gas).

(2) The daily NO_x emissions from each of the following two emission units (H-1100, SV13-098; and SC-1/2, SV13-155) are based on the following equation:

NO_x Emissions = constant (lb. NO_x /ppmv x acf) x concentration of NO_x in stack (ppmv) x stack flow (acf).

(3) The daily NO_x emissions from the steam usage at the ULTEM# resin operation (HppSTEAM) are based on the following equation:

NO_x Emissions = (lb. steam usage at ULTEM# resin operation/day) x (∑i=1-3 (lbs. NO_x from boiler i/MMBtu heat input at boiler i) x (scf natural gas used at boiler i) x (0.001024 MMBtu/scf natural gas))/(∑i=1-3 (lbs. steam produced by boiler i)), where “boiler i” represents the NE BOILER (SV01-101), the H BOILER (SV01-100), and the BW-GAS BOILER (SV01-014).

(4) The daily NO_x emissions from control device (H-2100, SV13-346), which controls emission units, (C-1001, C-1021, T-105, S-801), SV13-346) are based on the following equation:

NO_x Emissions = [(scf natural gas used/day) x emission factor (lb NO_x /scf natural gas)] + [(constant (lb TEA/day) x (number of vacuum systems associated with C-1021) - constant (lb TEA/day)) x emissions factor (lb NO_x /lb TEA) x (hours/day flow vented to SV 13-346) x (1 day/24 hours)].

The sum of the NO_x emissions from each of the emissions units above will equal the total daily NO_x emissions from the ULTEM# resin operation.

(b) The source may install a low- NO_x burner for either or both of the Hot Oil Heaters. Corresponding low- NO_x burner emission factors will be utilized in the NO_x emissions calculations under Condition Q.2.14(a).

Q.2.15 Methods and Procedures [326 IAC 11-8]

Pursuant to 326 IAC 11-8, which incorporates provisions of 40 CFR 60.2680, in order to comply with the emission limitations specified in Condition Q.2.3, the Permittee shall establish specific operating limits for the integrated abatement system associated with H-1100. The table that follows provides the specific applicable 40 CFR Part 60, Subpart DDDD compliance determination provisions that apply to the H-1100 and the condition number where descriptions of the provisions can be found in Section NN.

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.13	60.2680	What if I do not use a wet scrubber to comply with the emission limitations?
NN.14(a)	60.2690(a)	How do I conduct the initial and annual performance test?
NN.14(b)	60.2690(b)	How do I conduct the initial and annual performance test?
NN.14(c)	60.2690(c)	How do I conduct the initial and annual performance test?
NN.14(d)	60.2690(d)	How do I conduct the initial and annual performance test?
NN.14(e)	60.2690(e)	How do I conduct the initial and annual performance test?
NN.14(f)	60.2690(f)	How do I conduct the initial and annual performance test?
NN.14(g)	60.2690(g)	How do I conduct the initial and annual performance test?
NN.15	60.2695	How are the performance test data used?
NN.16	60.2700	How do I demonstrate initial compliance with the emission limitation and establish the operating limits?
NN.17	60.2705	By what dates must I conduct the initial performance test?
NN.18(a)	60.2710(a)	How do I demonstrate continuous compliance with the emission limitations and operating limits?
NN.18(b)	60.2710(b)	How do I demonstrate continuous compliance with the emission limitations and operating limits?
NN.18(c)	60.2710(c)	How do I demonstrate continuous compliance with the emission limitations and operating limits?
NN.19	60.2715	By what date must I conduct the annual performance test?

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.20(a)	60.2720(a)	May I conduct performance testing less often?
NN.20(b)	60.2720(b)	May I conduct performance testing less often?
NN.20(c)	60.2720(c)	May I conduct performance testing less often?
NN.21(a)	60.2725(a)	May I conduct a repeat performance test to establish new operating limits?
NN.21(b)	60.2725(b)	May I conduct a repeat performance test to establish new operating limits?
NN.22(c)	60.2730(c)	What monitoring equipment must I install and what parameters must I monitor?
NN.23(a)	60.2735(a)	Is there a minimum amount of monitoring data I must obtain?
NN.23(b)	60.2735(b)	Is there a minimum amount of monitoring data I must obtain?

Q.2.16 [Reserved]

Q.2.17 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with Q.2.6, the filters associated with facilities F-785, D-390, BSST, and F-205B shall be in operation at all times that material is being transferred into the facility except that filter operation is not required when only liquid is being transferred into BSST.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

Q.2.18 Vent Oxidizer H-2100 Operating Temperature

When Vent Oxidizer H-2100 is used to demonstrate compliance with Conditions Q.2.1(a) and Q.2.1(b), it shall maintain an operating temperature of 650 degrees Fahrenheit (°F) or the temperature determined in the most recent performance test that is the basis for the destruction efficiency used in the equations pursuant to Conditions Q.2.13(a)(8) and Q.2.13(b)(5). The temperature of the exhaust from the vent oxidizer shall be recorded at least once each minute whenever it is operating and used to meet emission limits. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the operating temperature average is below the established minimum temperature, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Conditions Q.2.1(a), and Q.2.1(b) of this permit

Q.2.19 Thermal Oxidizer H-1100 Requirements

To demonstrate compliance with Conditions Q.2.1(a) and Q.2.1(c), the oxidation, reduction and reoxidation furnaces of the Thermal Oxidizer H-1100 shall each operate at a minimum temperature of 1800 degrees Fahrenheit (0F) for a minimum retention time of one second, when waste is being burned in H-1100. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the operating temperature average is below the established minimum temperature, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Conditions Q.2.1(a) and Q.2.1(c) of this permit

Q.2.20 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust from emission units F-785 and BSST shall be performed once per week during normal daylight operations when exhausting to the atmosphere, except for weeks when transfer of solid material does not occur. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from F-785 and BSST, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

Q.2.21 Record Keeping and Reporting Requirements

(a) To determine compliance with the 365-day rolling totals for VOC and NO_x emissions set forth in Condition Q.2.1, the Permittee shall maintain records in accordance with (1) through (10) below:

(1) The tempered water outlet temperature on each of vent condensers C751B, C971, and C801 (each measured as a daily average, with at least one measurement on each condenser per hour for each day when the unit is in operation);

(2) The rate of the scrubbant water flow at the vent scrubber on emission unit PI/MMA HD (measured as a daily average, with at least one measurement per hour for each day when the unit is in operation);

(3) The amount of ULTEM# resin produced for each calendar day;

(4) The stack flow rate (acf) of, and the NO_x concentration (ppmv) in, the vent stream from the NO_x containment system SC-1/2 (SV13-155) and from the thermal oxidizer H-1100 (SV13-098) (each measured as a daily average, with at least one measurement of each per hour for each day when the unit is in operation);

(5) When the Displacement Vent Condenser C-1001, Exchange Vent Condenser C-1021, Lift Station S-801, or the Water Stripper T-105 is vented to the Vent Oxidizer H-2100, a log of the date, time and duration that the Vent Oxidizer H-2100 is operated and is bypassed;

(6) Amounts of natural gas fuel used by each of the existing hot oil heater H-900, the new hot oil heater H-900B, the Vent Oxidizer H-2100, the NE BOILER (SV01-101), the H BOILER (SV01-100), and the BW-GAS BOILER (SV01-014) for each calendar day when such unit is in operation;

(7) The pounds of steam produced each calendar day from each of the NE BOILER (SV01-101), the H BOILER (SV01-100), and the BW-GAS BOILER (SV01-014);

(8) Steam usage at the ULTEM# plant for each calendar day;

(9) The number of vacuum systems associated with C-1021; and

(10) The pounds NO_x per MMBtu heat input (calculated as the daily average of the hourly averages) from each of the NE BOILER (SV01-101), the H BOILER (SV01-100), and the BW-GAS BOILER (SV01-014) for each day when such boiler is in operation.

(b) Pursuant to 326 IAC 11-8, which incorporates provisions of 40 CFR 60, Subpart DDDD, and to document compliance with Condition Q.2.3, the Permittee shall keep records and submit reports as specified in the federal citations in the table below as described in Section NN.

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.24	60.2585	What must I include in the notifications of achievement of increments of progress?
NN.25	60.2590	When must I submit the notifications of achievement of increments of progress?
NN.26	60.2595	What if I do not meet an increment of progress?
NN.27(b)	60.2600(b)	How do I comply with the increment of progress for submittal of a control plan?
NN.28(a)	60.2660(a)	What site-specific documentation is required?
NN.28(c)	60.2660(c)	What site-specific documentation is required?
NN.29(a)	60.2665(a)	What if all the qualified operators are temporarily not accessible?
NN.29(b)	60.2665(b)	What if all the qualified operators are temporarily not accessible?
NN.30(a)	60.2740(a)	What records must I keep?
NN.30(b)	60.2740(b)	What records must I keep?
NN.30(c)	60.2740(c)	What records must I keep?
NN.30(d)	60.2740(d)	What records must I keep?
NN.30(e)	60.2740(e)	What records must I keep?
NN.30(f)	60.2740(f)	What records must I keep?
NN.30(g)	60.2740(g)	What records must I keep?
NN.30(h)	60.2740(h)	What records must I keep?
NN.30(i)	60.2740(i)	What records must I keep?
NN.30(j)	60.2740(j)	What records must I keep?
NN.30(k)	60.2740(k)	What records must I keep?

Section NN Permit Condition	Applicable 40 CFR Part 60, Subpart DDDD Requirement	Regulatory Citation Title
NN.30(l)	60.2740(l)	What records must I keep?
NN.30(m)	60.2740(m)	What records must I keep?
NN.31	60.2745	Where and in what format must I keep my records?
NN.32	60.2750	What reports must I submit?
NN.33	60.2760	What information must I submit following my initial performance test?
NN.34	60.2765	When must I submit my annual report?
NN.35	60.2770	What information must I include in my annual report?
NN.36	60.2775	What else must I report if I have a deviation from the operating limits or the emission limitations?
NN.37	60.2780	What must I include in the deviation report?
NN.38	60.2785	What else must I report if I have a deviation from the requirement to have a qualified operator accessible?
NN.39	60.2790	Are there any other notifications or reports that I must submit?
NN.40	60.2795	In what form can I submit my reports?
NN.41	60.2800	Can reporting dates be changed?

(c) [Reserved]

(d) Pursuant to 40 CFR 60.48c(g), Subpart Dc, the Permittee shall record and maintain records of the amounts of each fuel combusted during each month for emission units H-900 and H-900B. If an alternative record keeping requirement is approved by the Administrator in lieu of this condition, the Permittee shall comply with the alternative record keeping requirement upon approval from the Administrator and shall submit an application for a permit modification to IDEM, OAQ to incorporate the approved alternative record keeping into the Part 70 Operating Permit.

(e) Pursuant to 326 IAC 12, the Permittee shall maintain records of the dimensions and an analysis showing the capacity of the storage tanks, identified as V-970 and V-750B. These records shall be maintained for the life of the source.

(f) Pursuant to 326 IAC 12, the Permittee shall maintain a record of the VOL stored, the period of storage, and the maximum true vapor pressure of that VOL during the respective storage period for the storage vessel, identified as V-970, with a design capacity greater than or equal to 75 m3 but less than 151 m3 storing a liquid with a maximum true vapor pressure that is normally greater than or equal to 15.0 kPa.

(g) To document compliance with Condition Q.2.20, the Permittee shall maintain the weekly record of the visible emission notations required by Condition Q.2.20(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(h) All records required to be maintained by Condition Q.2.21 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(i) A quarterly summary of the information to document compliance with Condition Q.2.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Q.2.22 State Only Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units (NSPS) Requirements [326 IAC 12]

Pursuant to 326 IAC 12, the Permittee shall record and maintain records of the amounts of each fuel combusted during each day for emission units H-900 and H-900B. This Condition shall no longer apply when the State Implementation Plan's recordkeeping requirement is approved as revised from daily to monthly.

Section Q consists of the following Sections: Q.1, Q.2, and three (3) Part 70 Quarterly Reporting Forms.

Condition Q.2.22 concludes the Section Q requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition Q.2.1(a)
Facility: C-1011, V-700, V-710, F-785, F-205, V-753, C-861, W-515, MS-361, V-1550, V-1565B, V-790, F-205B, V-750B (C751B), C-971, S-800, PI/MMA HD, V-730, V-904, V-903, T-744, 100-T, 102-T, T-70, SC-1/2, V-79T, F400V, KO-500, V-903B, V-904B, T-79B, T-102B, T-70B, H-900, H-1100, H-900B, C-1001, C-1021, S-801, T-105, Steam Usage (identified as HppSTEAM), and fugitive VOC emissions (FUG) that are associated with the HPP process.
Parameter: VOC
Limit: 195.93 tons rolled on a 365-day basis

Month: _____ Year: _____

Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365 - day period	Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365 - day period
1			17		
2			18		
3			19		
4			20		
5			21		
6			22		
7			23		
8			24		
9			25		
10			26		
11			27		
12			28		
13			29		
14			30		
15			31		
16			**TOTAL**		

Note: This Report Form shall be submitted with a detail emissions calculation spreadsheet.

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____
Title / Position: _____
Signature: _____
Date: _____
Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION
Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition Q.2.1(b)
Facilities: C-1011, V-700, V-710, V-750B (C751B), V-971, V-730, H-900, C-1001, C-1021, S-801, and T-105
Parameter: VOC
Limit: 39.49 tons rolled on a 365-day basis

Month: _____ Year: _____

Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365 - day period	Day	VOC Emissions this day (ton/day)	VOC Emissions for the last 365 - day period
1			17		
2			18		
3			19		
4			20		
5			21		
6			22		
7			23		
8			24		
9			25		
10			26		
11			27		
12			28		
13			29		
14			30		
15			31		
16			**TOTAL**		

Note: This Report Form shall be submitted with a detail emissions calculation spreadsheet.

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition Q.2.1(c)
Facility: Hot Oil Heaters H-900, H-900B; Liquid Waste Incinerator H-1100; NO_x Containment System SC-1/2; Vent oxidizer H-2100; Steam Usage (identified as HppSTEAM); and C-1021
Parameter: NO_x
Limit: 133.77 tons rolled on a 365-day basis

Month: _____ Year: _____

Day	NO_X Emissions this day (ton/day)	NO_X Emissions for the last 365 - day period	Day	NO_X Emissions this day (ton/day)	NO_X Emissions for the last 365 - day period
1			17		
2			18		
3			19		
4			20		
5			21		
6			22		
7			23		
8			24		
9			25		
10			26		
11			27		
12			28		
13			29		
14			30		
15			31		
16			**TOTAL**		

Note: This Report Form shall be submitted with a detail emissions calculation spreadsheet showing the breakdown of fuel, feed rates, and actual NOx monitor reading from each facility.

☐ No deviation occurred in this month.
☐ Deviation/s occurred in this month.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

Attach a signed certification to complete this report

SECTION R.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: HPP Finishing, Building 62

HPP Finishing Operations

(a) The HPP Finishing operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity[c]	Date of Construct
13-035	DC-08	LARGE FINE GRINDER	None	None	0.60 tons/ hour	N/A

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices [b]	Maximum Capacity [c]	Date of Construct
13-070	B-02	B-02 BLOWER	None	Filter	3.78 tons/ hour	1985
13-071	B-01	B-01 BLOWER	None	Filter	3.78 tons/ hour	1985
13-154	C1 DHE	C1 DIE HEAD EXHAUST	None	None	Less than 0.05 tons/hour	N/A
13-165	L-3	PELLET TRANSFER	None	Filter	1.25 tons/ hour	N/A
13-166	L-4	PELLET TRANSFER	None	Filter	1.25 tons/ hour	N/A
13-167	RTV	RESIN TRANSFER VENT	None	Filter	2.50 tons/ hour	N/A
13-168	FPT	FINISHED PRODUCT TRANSFER	None	Filter	1.25 tons/ hour	N/A
13-251	BF-L1	LINE 1 PELLET TRANSFER	None	Filter	0.23 tons/ hour	N/A
13-252	BF-L2	LINE 2 PELLET TRANSFER	None	Filter	0.23 tons/ hour	N/A
13-254	BF-NFG	EAST FINE GRINDER	None	Filter	0.60 tons/ hour	N/A
13-255	CLDC	COLOR LAB DUST COLLECTION	None	Filter	0.07 tons/ hour	N/A
13-256	A/B - FG	WEST FINE GRINDER	None	Filter	1.20 tons/ hour	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

R.1.1 Particulate [326 IAC 6-3-2]

(a) Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the emission units listed in the table below shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for specific emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
13-035	DC-08	0.60	2.91
13-070	B-02	3.78	9.99
13-071	B-01	3.78	9.99
13-165	L-3	1.25	4.76
13-166	L-4	1.25	4.76
13-167	RTV	2.50	7.58
13-168	FPT	1.25	4.76
13-251	BF-L1	0.23	1.53
13-252	BF-L2	0.23	1.53
13-254	BF-NFG	0.60	2.91
13-255	CLDC	0.07	0.690
13-256	A/B - FG	1.20	4.63

(b) Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission unit C1DHE shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for emission unit C1DHE becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

R.1.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with R.1.1, the filters associated with facilities B-02, B-01, L-3, L-4, RTV, FPT, BF-L1, BF-L2, BF-NFG, CLDC, and A/B - FG shall be in operation at all times that material is being transferred into the facility.

Compliance Monitoring Requirements [326 IAC 2-5.1-3(e)(2)] [326 IAC 2-6.1-5(a)(2)]

R.1.3 Visible Emissions Notations

(a) Visible emission notations of the stack exhaust for emission units B-02 and B-01 shall be performed once per week during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.

(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to result in higher emissions.

(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.

(e) If abnormal emissions are observed at the stack exhausts from B-02 and B-01, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions or Exceedances. An observation of abnormal emissions that do not violate 326 IAC 6-4 (Fugitive Dust Emissions) or an applicable opacity limit is not a deviation from this permit.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

R.1.4 Record Keeping Requirements

(a) To document compliance with Condition R.1.3, the Permittee shall maintain the weekly record of the visible emission notations required by Condition R.1.3(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition R.1.4, shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Section R consists of the following Sections: R.1.

Condition R.1.4 concludes the Section R requirements of this permit

SECTION S.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Emergency Generators and Pumps, Entire Plant Site

Emergency Generators and Pumps

(a) The site generators and pumps listed below are considered the emergency generators and pumps identified as a group, 17-Emer-G. Each emergency generator or pump which is associated with this group is individually identified with an affiliated stack/vent I.D; plant location; date in which the emergency generator or pump was installed; rated horsepower (hp); and heat input.

Stack / Vent I.D	Plant Location	Date Installed	Rated HP	MMBTU/hr
GENERATORS				
17-101	Phenol	Jun-83	760	5.3
17-102	Phenol	Oct-83	450	3.2
17-103	MWTP	Aug-82	900	6.3
17-104	BPA III	Apr-86	1490	10.4
17-105	LEXAN# Resin	Nov-86	1770	12.4
17-106	LEXAN# Resin	Nov-86	1770	12.4
17-107	LEXAN# Resin	Jun-79	930	6.5
17-108	BPA I & II	Feb-82	17	0.1
17-110	LDF	Sep-86	760	5.3
17-111	LDF	Sep-86	760	5.3
17-112	Phosgene	May-80	1600	11.2
17-113	Phosgene	Oct-86	1490	10.4
17-114	Brine	Dec-85	1770	12.4
17-115	Brine	Jan-87	1770	12.4
17-120	ETS	1991	119	0.8
17-121	ULTEM# Monomer	May-90	900	6.3
17-129[(a)]	Sheet Products	1980	10	0.1
17-130	Sheet Products	Mar-95	60	0.4
17-134	CPP Resin II	Jan-95	1503	10.5
17-135	Bldg. 46 ECC	Feb-96	120	0.8
17-410	Visitor Center	1999	158	1.1
PUMPS				
17-302	Phenol	Jun-90	280	2
17-303	Phenol	Jun-90	280	2
17-304	Phenol	Jun-90	280	2
17-411	Mil Water Diesel Pump	1999	300	2.1
17-412	Mil Water Diesel Pump	1999	300	2.1
17-413	Mil Water Diesel Pump	1999	300	2.1
FIRE PUMPS				
17-403	CT#2	1970	220	1.5
17-404	CT#2	1970	220	1.5
17-405	MWTP/BPA	Jan-74	280	2
17-406	MWTP/Bldg. 18	Jun-78	310	2.2
17-407	MWTP/Bldg. 18	Jun-78	310	2.2
17-408	Safety/Phenol	Apr-89	340	2.4
17-409	Safety/Phenol	Apr-89	340	2.4

[(a)] Stack/Vent ID 17-129 is associated with a gasoline emergency generator; all other emergency generators or pumps listed in this table burn diesel.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

S.1.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

Pursuant to Construction Permit CP 129-3607-00002, issued on August 18, 1994, as revised through the Title V permit, the NO_x emissions from the combustion of diesel fuel for the group of

emergency generators and pumps, identified as 17-Emer-G, shall not exceed 39.5 tons per twelve (12) consecutive month period with compliance determined at the end of each month. This limit will ensure that oxides of nitrogen (NO_x) emissions are less than 40 tons per twelve (12) consecutive month period and make 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

S.1.2 NO_x Limit Compliance Determination

For purposes of determining compliance with the NO_x limit described in Condition S.1.1, the Permittee shall determine the monthly NO_x emissions using the equation below:

NO_x emissions (tons/month) = (EF_1) x [1 ton/2000 lbs] x [actual diesel fuel usage (gallons/month)] x [137,000 Btu/gallon diesel]

Where: EF_1 = 4.41 lb NO_x /MMBtu or the emission factor determined from emissions testing.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

S.1.3 Record Keeping Requirements

(a) To document compliance with Condition S.1.1 the Permittee shall maintain monthly records of actual diesel fuel usage for the group of emergency generators and pumps, identified as 17-Emer-G. The Permittee may determine actual diesel fuel usage by quantity of the fuel input to the group of emergency generators and pumps identified as 17-Emer-G.

(b) All records required to be maintained by Condition S.1.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

S.1.4 Reporting Requirements

A quarterly summary of monthly NO_x emissions to document compliance with Condition S.1.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

SECTION S.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Emergency Generators and Pumps, Entire Plant Site

Standby Energy Curtailment Generators and Mobile Diesel Units

(b) The generators and mobile diesel units listed below are considered the energy curtailment generators and mobile diesel units identified as a group, 17-S_M-G. Each energy curtailment generator or mobile diesel unit which is associated with this group is individually identified with an affiliated stack/vent I.D; plant location; date in which the energy curtailment generator or mobile diesel unit was installed; rated horsepower (hp); and heat input.

Stack / Vent I.D	Plant Location	Date Installed	Rated HP	MMBTU/hr
STANDBY ENERGY CURTAILMENT DIESEL GENERATORS AND MOBILE DIESEL UNITS				
17-116	CPP Resin III	1984	1580	11.2
17-117	CPP Resin III	1984	1580	11.2
17-118	WWTP Lift Station	1990	2220	15.7
17-119	WWTP Lift Station	1990	2220	15.7
17-125	Substation 2	1994	2161	15.3
17-126	Substation 2	1994	2161	15.3
17-127	Substation 2	1994	1503	10.6
17-131	Substation 1	1995	2161	15.3
17-132	Substation 1	1995	2161	15.3
17-133	Substation 1	1995	2161	15.3

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

S.2.1 Prevention of Significant Deterioration (PSD) [326 IAC 2-2]

Pursuant to Construction Permit CP 129-3607-00002, issued on August 18, 1994, as revised through the Title V permit, the NO_x emissions from the combustion of diesel fuel for the group of energy curtailment generators and mobile diesel units identified as a group, 17-S_M-G, shall not exceed 39.9 tons per twelve (12) consecutive month period with compliance determined at the end of each month. This limit will ensure that oxides of nitrogen (NO_x) emissions are less than 40 tons per twelve (12) consecutive month period and make 326 IAC 2-2, Prevention of Significant Deterioration not applicable.

S.2.2 NO_x Limit Compliance Determination

For purposes of determining compliance with the NO_x limit described in Condition S.2.1, the Permittee shall determine the monthly NO_x emissions using the equation below:

NO_x emissions (tons/month) = (EF_2) x [1 ton/2000 lbs] x [actual diesel fuel usage (gallons/month)] x [137,000 Btu/gallon diesel]

Where: EF_2 = 3.2 lb NO_x /MMBtu or the emission factor determined from emissions testing.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

S.2.3 Record Keeping Requirements

(a) To document compliance with Condition S.2.1 the Permittee shall maintain monthly records of actual diesel fuel usage for the group of energy curtailment generators and mobile diesel units identified as 17-S_M-G. The Permittee may determine actual fuel

usage by quantity of the fuel input to the group of emergency generators and pumps identified as 17-S_M-G.

(b) All records required to be maintained by Condition S.2.3 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

S.2.4 Reporting Requirements

A quarterly summary of monthly NO_x emissions to document compliance with Condition S.2.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the “responsible official” as defined by 326 IAC 2-7-1(34).

SECTION S.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Emergency Generators and Pumps, Entire Plant Site

Temporary Emergency Generators

(c) The generators listed below represent temporary, portable, emergency generators. Each emergency generator is individually identified with an affiliated stack/vent I.D.; plant location, rated horsepower (hp); and heat input. Generator units may vary depending upon which units are available when needed.

Stack / Vent I.D	Emission Unit	Plant Location	Maximum Capacity	Heat Input Capacity (MMBtu/hr)
17-500	Generator 17-500	AS NEEDED	2,332 HP	15.22
17-501	Generator 17-501	AS NEEDED	2,332 HP	15.22

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

S.3.1 Emergency Generator Service

The emergency generators to which this section applies shall be limited as provided below:

(a) Each generator shall be limited to less than 500 hours of operation per twelve (12) consecutive month period with compliance determined at the end of each month.

(b) Each generator shall operate on No. 2 diesel fuel.

Section S consists of the following Sections: S.1, S.2, S.3 and two (2) Part 70 Quarterly Reporting Forms.

Condition S.3.1 concludes the Section S requirements of this permit

Reporting forms immediately follow.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition S.1.1
Facility: Emergency Generators and Pumps identified as17-Emer-G
Parameter: NO_x emissions
Limit: 39.5 tons per twelve (12) consecutive month period with compliance determined at the end of each month

YEAR: _____ QUARTER:_____

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.
Deviation has been reported on:

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

Part 70 Quarterly Report

Source Name: SABIC Innovative Plastics Mt. Vernon, LLC
Source Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Part 70 Permit No.: T129-6794-00002; Condition S.2.1
Facility: Energy Curtailment Generators and Mobil Diesel Units identified as17-S_M-G
Parameter: NO_x emissions
Limit: 39.9 tons per twelve (12) consecutive month period with compliance determined at the end of each month

YEAR: _____ QUARTER: _____

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.
Deviation has been reported on:

Submitted by: _____

Title / Position: _____

Signature:_____

Date: _____

Phone: _____

Attach a signed certification to complete this report.

SECTION T.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: High Bay, Building 1A

High Bay Operations

(a) The High Bay operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D, the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Insignificant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
18-001	R104OD	ROOM 104 OVEN DRYERS	None	None	less than 100 lbs/hr	N/A
18-002	R102E	ROOM 102 EXTRUDERS	None	None	less than 100 lbs/hr	N/A
18-004	PRODEX S4E	PRODEX S-4 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-005	EGAN S5	EGAN S-5 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-006	HPM(S6)E	HPM S-6 EXTRUDER	None	None	less than 100 lbs/hr	N/A
18-007	R105/102VB	R105/102 VACUUM BLOWER	None	None	less than 100 lbs/hr	N/A
18-008	R103BVS	LEXAN# BLEND ROOM AND POWDER TRANSFER	None	Baghouse	less than 100 lbs/hr	N/A
18-010	R102EV	ROOM 102 EXTRUDERS VACUUM	None	None	less than 100 lbs/hr	N/A
18-011	B1BMMO	BLDG. 1B MOLDING MACHINES/OVENS	None	None	less than 100 lbs/hr	N/A

(a) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

T.1.1 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2(e)(2) (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from emission units R104OD, R102E, PRODEX S4E, EGAN S5, HPM(S6)E, R105/102VB, R103BVS, R102EV, and B1BMMO shall not exceed 0.551 pound per hour because the process weight rate is less than one hundred (100) pounds per hour. If the process weight rate for any of these emission units becomes 100 pounds per hour or greater, such unit shall be limited pursuant to the applicable equation in 326 IAC 6-3-2(e)(3).

Compliance Determination Requirements

T.1.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with T.1.1, the filter associated with emission unit R103BVS shall be in operation at all times that material is being transferred into the facility.

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

Section T consists of the following Sections: T.1.

Condition T.1.2 concludes the Section T requirements of this permit

: LEXAN is a trademark of SABIC Innovative Plastics IP BV
: ULTEM is a trademark of SABIC Innovative Plastics IP BV

SECTION U.1 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Wastewater Treatment Plant

Wastewater Treatment Plant (WWTP) Operations

(a) The Wastewater Treatment Plant (WWTP) operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D, the emission unit description; the type of air pollution control device (APCD), if present; the type of recovery device (considered integral to the process), if present; and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include insignificant activities listed in Section A.21 of this permit.

Significant Activities [a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
16-100	WWTP*	SITE WASTEWATER TREATMENT PLANT	None	None	N/A	N/A

Insignificant Activities [d]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity [c]	Date of Construct
16-101	PAC SVF**	PAC SILO VENT FILTER	None	Filter	8 tons/hr	N/A

a Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).
b. Equipment is integral to the process operation.
c. When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
d. Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21)).

* The wastewater treatment plant area consists of circular clarifiers, rectangular equalization basins, aeration basins, three six-million gallon open-top impoundment tanks, and other wastewater treatment system equipment.

** The emission unit identified as PAC SVF is a powdered activated carbon storage silo with a bin vent filter. The carbon is pneumatically transferred from the truck to the silo and the filter, which is integral to the process, because the filter is needed to separate the carbon from the transfer air.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

U.1.1 Particulate [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes), the allowable particulate emission rate from the PAC silo vent filter (PAC SVF) shall not exceed the emission rate calculated using the following equation:

$E = 4.10\ P^{0.67}$ where E = rate of emission in pounds per hour; and
P = process weight rate in tons per hour

The following table sets forth the current maximum process weight rate for these emission units and the allowable rate of emissions calculated for that process weight rate. The current maximum process weight rate shown is not a limitation.

Stack/Vent ID	Emission Unit ID	P = Current Max Process Weight Rate (tons/hr)	E = Calculated Rate of Emission (lb/hr)
16-101	PAC SVF	8.0	16.5

Compliance Determination Requirements

U.1.2 Particulate Control [326 IAC 2-7-6(6)]

In order to comply with U.1.1, the filter associated with emission unit PAC SVF shall be in operation at all times that material is being transferred into the facility.

Section U consists of the following Sections: U.1.

Condition U.1.2 concludes the Section U requirements of this permit

ATTACHMENT A

IDEM, OAQ Determinations Regarding SABIC Innovative Plastics Mt. Vernon, LLC

ATTACHMENT A –
IDEM, OAQ Determinations Regarding
SABIC Innovative Plastics Mt. Vernon, LLC

In addition to the nonapplicability determinations set forth in Sections D - U of this permit, the IDEM, OAQ has made the following determination regarding this source:

Rule	Does not apply to	Permit Section	Reason for Non-applicability
40 CFR 60, Subpart III	HPP CoPolymer and ChemOps	P and Q	The HPP CoPolymer and ChemOps areas do not manufacture any of the chemicals listed in 40 CFR 60.617.
40 CFR 60, Subpart NNN	HPP CoPolymer and ChemOps	P and Q	The HPP CoPolymer and ChemOps areas do not manufacture any of the chemicals listed in 40 CFR 60.667.
40 CFR 60, Subpart D	BW1 Boiler BW2 Boiler E Boiler L Boiler R Boiler BW Boiler	E and K	The boilers do not have a heat input rate greater than 250 million Btu per hour and do not meet the applicability criteria in 40 CFR 60.40(a).
40 CFR 60, Subpart VV	HPP CoPolymer and ChemOps	P and Q	The HPP CoPolymer and ChemOps areas do not manufacture any of the chemicals listed in 40 CFR 60.489.
40 CFR 60, Subpart DDD	Site manufacturing operations		Site operations do not manufacture polypropylene, polyethylene, polystyrene, or poly(ethylene terephthalate) as defined in 40 CFR 60.561.
40 CFR 60, Subpart FFF	Site manufacturing		The site does not have rotogravure printing lines used to coat flexible vinyl or urethane products.
40 CFR 60, Subpart TTT	Site manufacturing		Site manufacturing does not include spray booths in which plastic parts for use in the manufacture of business machines receive prime coats, color coats, texture coats, or touch-up coats (as those terms are defined in 40 CFR 60.721).
40 CFR 63, Subpart Q	All site industrial process cooling towers		The site industrial process cooling towers have not operated with chromium-based water treatment chemicals on or after September 8, 1994.
40 CFR 63, Subpart F, G, and H	V-525A V-525B	E	V-525A and V-525B are not part of a CMPU subject to the HON.
40 CFR 63, Subpart DD	Site operations		The site does not meet the criteria specified in 40 CFR 63.680(a)(2).
40 CFR 63, Subparts I and YY	LDF operations	M	The LDF is a research and development facility.
40 CFR 63, Subparts F, G and H	BPA Pilot Plant	F	The BPA Pilot Plant is a research and development facility.
40 CFR 63, Subpart J	Site manufacturing processes		Site manufacturing processes do not meet the applicability criteria in 40 CFR 63.211 (i.e., they are not a PVC plant, as defined in 40 CFR 61.61(c)).
40 CFR 63, Subpart U	Site manufacturing processes		Site manufacturing processes do not meet the applicability criteria in 40 CFR 63.480(a) because they do not manufacture an elastomer product, as defined in 40 CFR 63.482(b).
40 CFR 63, Subpart W	Site manufacturing processes		Site manufacturing processes do not meet the applicability criteria in 40 CFR 63.520 because they do not manufacture basic liquid epoxy resins (BLR) or wet strength resins (WSR), as defined in 40 CFR 63.522.

Rule	Does not apply to	Permit Section	Reason for Non-applicability
40 CFR 63, Subpart JJJ	Site manufacturing processes		Site manufacturing processes do not meet the applicability criteria in 40 CFR 63.1310(a) because they do not manufacture a thermoplastic product, as defined in 40 CFR 63.1312.
40 CFR 63, Subpart WWWW	Site manufacturing processes		Site manufacturing processes do not meet the applicability criteria in 40 CFR 63.5785 (i.e., they are not operations in which reinforced and/or nonreinforced plastic composites or plastic molding compounds are manufactured using thermoset resins and/or gel coats that contain styrene to produce plastic composites.
40 CFR 63, Subpart NNNNN	HCl manufacturing in the Brine operation	H	The facility produces HCl through the direct synthesis of hydrogen and chlorine and is part of a chlor-alkali plant.
326 IAC 8-6	Site source		The source is located in Posey County and commenced operation before October 7, 1974.
326 IAC 10-4	Site boilers		No site boiler meets the definition of a “large affected unit” or “electricity generating unit”, as defined in 326 IAC 10-4-2.

SECTION AA 40 CFR 63, Subpart F National Emission Standards for Organic Hazardous Air Pollutants From the Synthetic Organic Chemical Manufacturing Industry

Definitions contained in 40 CFR Part 63, Subpart F, Section 101 are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2-7-5(1)]

AA.1 General Standards [326 IAC 14][40 CFR 63.102, Subpart F]

(a) Pursuant to 40 CFR 63.102(a), the Permittee of sources subject to 40 CFR 63, Subpart F shall comply with the requirements of 40 CFR Part 63, Subparts G and H.

(1) The provisions set forth in 40 CFR Part 63, Subpart F and Subpart G shall apply at all times except during periods of start up or shutdown (as defined in 40 CFR 63.101), malfunction, or non operation of the chemical manufacturing process unit (or specific portion thereof) resulting in cessation of the emissions to which 40 CFR Part 63, Subpart F and Subpart G apply. However, if a start up, shutdown, malfunction or period of non operation of one portion of a chemical manufacturing process unit does not affect the ability of a particular emission point to comply with the specific provisions to which it is subject, then that emission point shall still be required to comply with the applicable provisions of 40 CFR Part 63, Subpart F and Subpart G during the start up, shutdown, malfunction or period of non operation. For example, if there is an overpressure in the reactor area, a storage vessel in the chemical manufacturing process unit would still be required to be controlled in accordance with 40 CFR 63.119. Similarly, the degassing of a storage vessel would not affect the ability of a process vent to meet the requirements of 40 CFR 63.113.

(2) The provisions set forth in 40 CFR Part 63, Subpart H shall apply at all times except during periods of start up or shutdown, as defined in 40 CFR 63.101(b), malfunction, process unit shutdown (as defined in 40 CFR 63.161), or non operation of the chemical manufacturing process unit (or specific portion thereof) in which the lines are drained and depressurized resulting in cessation of the emissions to which 40 CFR Part 63, Subpart H applies.

(3) The Permittee shall not shut down items of equipment that are required or utilized for compliance with the provisions of 40 CFR Part 63, Subpart F, Subpart G or H during times when emissions (or, where applicable, wastewater streams or residuals) are being routed to such items of equipment, if the shutdown would contravene requirements of 40 CFR Part 63, Subpart F, Subpart G or H applicable to such items of equipment. Paragraph 40 CFR 63.102(a)(3) does not apply if the item of equipment is malfunctioning, or if the Permittee must shut down the equipment to avoid damage due to a contemporaneous start up, shutdown, or malfunction of the chemical manufacturing process unit or portion thereof.

(4) During start ups, shutdowns, and malfunctions when the requirements 40 CFR Part 63, Subpart F, Subparts G and/or H do not apply pursuant to 40 CFR 63.102(a)(1) through 63.102(a)(3), the Permittee shall implement, to the extent reasonably available, measures to prevent or minimize excess emissions to the extent practical. For purposes of 40 CFR 63.102(a)(4), the term “excess emissions” means emissions in excess of those that would have occurred if there were no start up, shutdown, or malfunction and the Permittee complied with the relevant provisions of 40 CFR Part 63, Subpart F, Subparts G and/or H. The measures to be taken shall be identified in the applicable start up, shutdown, and malfunction plan, and may include, but are not limited to, air pollution control technologies, recovery technologies, work practices, pollution prevention, monitoring, and/or changes in the manner of operation of the source. Back up control devices are not required, but may be used if available.

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

AA.2 Heat Exchange System Requirements [326 IAC 14][40 CFR 63.104, Subpart F]

(a) Pursuant to 40 CFR 63.104(a), unless one or more of the conditions specified in 40 CFR 63.104(a)(1) through (a)(6) are met, the Permittee of sources subject to 40 CFR 63, Subpart F shall monitor each heat exchange system used to cool process equipment in a chemical manufacturing process unit meeting the conditions of 40 CFR 63.100(b)(1) through (b)(3), except for chemical manufacturing process units meeting the condition specified in 40 CFR 63.100(c), according to the provisions in either 40 CFR 63.104(b) or (c). Whenever a leak is detected, the Permittee shall comply with the requirements in 40 CFR 63.102(d).

(1) The exchange system is operated with the minimum pressure on the cooling water side, at least 35 kilopascals greater than the maximum pressure on the process side.

(2) Intervening cooling fluid contains less than 5 percent by weight of total hazardous air pollutants as specified in table 4 of 40 CFR 63 Subpart F, between the process and the cooling water. This intervening fluid serves to isolate the cooling water from the process fluid and the intervening fluid is not sent through a cooling tower or discharged. For purposes of 40 CFR 63.104(a), discharge does not include emptying for maintenance purposes.

(3) [Reserved]

(4) [Reserved]

(5) The recirculating heat exchange system is used to cool process fluids that contain less than 5 percent by weight of total hazardous air pollutants listed in Table 4 of 40 CFR Part 63, Subpart F.

(6) The once through heat exchange system is used to cool process fluids that contain less than 5 percent by weight of total hazardous air pollutants listed in Table 9 of 40 CFR Part 63, Subpart G.

(b) Pursuant to 40 CFR 63.104(b), the Permittee who elects to comply with the requirements of 40 CFR 63.104(a) by monitoring the cooling water for the presence of one or more organic hazardous air pollutants or other representative substances whose presence in cooling water indicates a leak shall comply with the requirements specified in 40 CFR 63.104(b)(1) through 63.104(b)(6). The cooling water shall be monitored for total hazardous air pollutants, total volatile organic compounds, total organic carbon, one or more speciated HAP compounds, or other representative substances that would indicate the presence of a leak in the heat exchange system.

(1) The cooling water shall be monitored quarterly.

(2) (i) For recirculating heat exchange systems (cooling tower systems), the monitoring of speciated hazardous air pollutants or total hazardous air pollutants refers to the hazardous air pollutants listed in Table 4 of 40 CFR Part 63, Subpart F.

(ii) [Reserved]

(3) The concentration of the monitored substance(s) in the cooling water shall be determined using any EPA approved method listed in Part 136 of 40 CFR Chapter I; as long as the method is sensitive to concentrations as low as 10 parts per million and the same method is used for both entrance and exit samples. Alternative methods may be used upon approval by IDEM, OAQ.

(4) The samples shall be collected either at the entrance and exit of each heat exchange system or at locations where the cooling water enters and exits each heat exchanger or any combination of heat exchangers. Entrance and exit points depend system type, definitions for each are provided in 40 CFR 63.104(b)(4)(i) through 63.104(b)(4)(iii):

(i) For samples taken at the entrance and exit of recirculating heat exchange systems, the entrance is the point at which the cooling water leaves the cooling tower prior to being returned to the process equipment and the exit is the point at which the cooling water is introduced to the cooling tower after being used to cool the process fluid.

(ii) For samples taken at the entrance and exit of once through heat exchange systems, the entrance is the point at which the cooling water enters and the exit is the point at which the cooling water exits the plant site or chemical manufacturing process units.

(iii) For samples taken at the entrance and exit of each heat exchanger or any combination of heat exchangers in chemical manufacturing process units, the entrance is the point at which the cooling water enters the individual heat exchanger or group of heat exchangers and the exit is the point at which the cooling water exits the heat exchanger or group of heat exchangers.

(5) A minimum of three sets of samples shall be taken at each entrance and exit as defined in 40 CFR 63.104(b)(4). The average entrance and exit concentrations shall then be calculated. The concentration shall be corrected for the addition of any makeup water or for any evaporative losses, as applicable.

(6) A leak is detected if the exit mean concentration is found to be greater than the entrance mean using a one sided statistical procedure at the 0.05 level of significance and the amount by which it is greater is at least 1 part per million or 10 percent of the entrance mean, whichever is greater.

(c) Pursuant to 40 CFR 63.104(c), the Permittee who elects to comply with the requirement of 40 CFR 63.104(a) by monitoring using a surrogate indicator of heat exchange system leaks shall comply with the requirements specified in 40 CFR 63.104(c)(1) through 63.104(c)(3). Surrogate indicators that could be used to develop an acceptable monitoring program are ion specific electrode monitoring, pH, conductivity or other representative indicators.

(1) The Permittee shall prepare and implement a monitoring plan that documents the procedures that will be used to detect leaks of process fluids into cooling water. The plan shall require monitoring of one or more surrogate indicators or monitoring of one or more process parameters or other conditions that indicate a leak. Monitoring that is already being conducted for other purposes may be used to satisfy the requirements of 40 CFR 63.104. The plan shall include the information specified in 40 CFR 63.104(c)(1)(i) and 63.104(c)(1)(ii).

(i) A description of the parameter or condition to be monitored and an explanation of how the selected parameter or condition will reliably indicate the presence of a leak.

(ii) The parameter level(s) or conditions(s) that shall constitute a leak. This shall be documented by data or calculations showing that the selected levels or conditions will reliably identify leaks. The monitoring must be sufficiently sensitive to determine the range of parameter levels or conditions when the system is not leaking. When the selected parameter level or condition is outside that range, a leak is indicated.

(iii) The monitoring frequency which shall be no less frequent than quarterly.

(iv) [Applicable under AA.7]

(2) If a substantial leak is identified by methods other than those described in the monitoring plan and the method(s) specified in the plan could not detect the leak, the Permittee shall revise the plan and document the basis for the changes. The Permittee shall complete the revisions to the plan no later than 180 days after discovery of the leak.

(3) The Permittee shall maintain, at all times, the monitoring plan that is currently in use. The current plan shall be maintained on site, or shall be accessible from a central location by computer or other means that provides access within 2 hours after a request. If the monitoring plan is superseded, the Permittee shall retain the most recent superseded plan at least until 5 years from the date of its creation. The superseded plan shall be retained on site (or accessible from a central location by computer or other means that provides access within two hours after a request) for at least 6 months after its creation.

(d) Pursuant to 40 CFR 63.104(d), if a leak is detected according to the criteria of 40 CFR 63.104(b) or 63.104(c), the Permittee shall comply with the requirements in 40 CFR 63.104(d)(1) and 63.104(d)(2), except as provided in 40 CFR 63.104(e).

(1) The leak shall be repaired as soon as practical but not later than 45 calendar days after the Permittee receives results of monitoring tests indicating a leak. The leak shall be repaired unless the Permittee demonstrates that the results are due to a condition other than a leak.

(2) Once the leak has been repaired, the Permittee shall confirm that the heat exchange system has been repaired within 7 calendar days of the repair or startup, whichever is later.

(e) Pursuant to 40 CFR 63.104(e), delay of repair of heat exchange systems for which leaks have been detected is allowed if the equipment is isolated from the process. Delay of repair is also allowed if repair is technically infeasible without a shutdown and any one of the conditions in 40 CFR 63.104(e)(1) or 63.104(e)(2) is met. All time periods in 40 CFR 63.104(e)(1) and 63.104(e)(2) shall be determined from the date when the Permittee determines that delay of repair is necessary.

(1) If a shutdown is expected within the next 2 months, a special shutdown before that planned shutdown is not required.

(2) If a shutdown is not expected within the next 2 months, the Permittee may delay repair as provided in 40 CFR 63.104(e)(2)(i) or 63.104(e)(2)(ii). Documentation of a decision to delay repair shall state the reasons repair was delayed and shall specify a schedule for completing the repair as soon as practical.

(i) If a shutdown for repair would cause greater emissions than the potential emissions from delaying repair, the Permittee may delay repair until the next shutdown of the process equipment associated with the leaking

heat exchanger. The Permittee shall document the basis for the determination that a shutdown for repair would cause greater emissions than the emissions likely to result from delaying repair as specified in 40 CFR 63.104(e)(2)(i)(A) and 63.104(e)(2)(i)(B).

(A) The Permittee shall calculate the potential emissions from the leaking heat exchanger by multiplying the concentration of total hazardous air pollutants listed in Table 4 of 40 CFR Part 63, Subpart F in the cooling water from the leaking heat exchanger by the flowrate of the cooling water from the leaking heat exchanger by the expected duration of the delay. The Permittee may calculate potential emissions using total organic carbon concentration instead of total hazardous air pollutants listed in Table 4 of 40 CFR Part 63, Subpart F.

(B) The Permittee shall determine emissions from purging and depressurizing the equipment that will result from the unscheduled shutdown for the repair.

(ii) If repair is delayed for reasons other than those specified in 40 CFR 63.104(e)(2)(i), the Permittee may delay repair up to a maximum of 120 calendar days. The Permittee shall demonstrate that the necessary parts or personnel were not available.

(f) [Applicable under Condition AA.7]

AA.3 Maintenance Wastewater Requirements [326 IAC 14][40 CFR 63.105, Subpart F]

(a) Pursuant to 40 CFR 63.105(a), each subject Permittee shall comply with the requirements 40 CFR 63.105(b) through 63.105(e) for maintenance wastewaters containing organic HAP's listed in Table 9 of 40 CFR Part 63, Subpart G.

(b) [Applicable under Condition AA.8]

(c) [Applicable under Condition AA.8]

(d) Pursuant to 40 CFR 63.105(d), the Permittee shall implement the procedures described in 40 CFR 63.105(b) and 63.105(c) as part of the start up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3) of Subpart A.

(e) [Applicable under Condition AA.8]

Compliance Determination Requirements

AA.4 General Compliance, Reporting, and Recordkeeping Provisions [326 IAC 14][40 CFR 63.103, Subpart F]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.103(b), initial performance tests and initial compliance determinations shall be required only as specified in 40 CFR Part 63, Subparts G and H.

(1) Performance tests and compliance determinations shall be conducted according to the schedule and procedures in 40 CFR 63.7(a) of Subpart A and the applicable sections of 40 CFR Part 63, Subparts G and H.

(2) [Applicable under Condition AA.6]

(3) Performance tests shall be conducted according to the provisions of 40 CFR 63.7(a) of Subpart A, except that performance tests shall be conducted at

maximum representative operating conditions for the process. During the performance test, the Permittee may operate the control or recovery device at maximum or minimum representative operating conditions for monitored control or recovery device parameters, whichever results in lower emission reduction.

(4) Data shall be reduced in accordance with the EPA approved methods specified in the applicable subpart or, if other test methods are used, the data and methods shall be validated according to the protocol in Method 301 of Appendix A of 40 CFR Part 63.

(5) [Applicable under Condition AA.6]

(6) [Reserved]

(c) [Applicable under AA.6]

(d) [Applicable under AA.6]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

AA.5 Identification of Process Vents Subject to 40 CFR 63, Subpart F [326 IAC 14][40 CFR 63.107, Subpart F]

(a) Pursuant to 40 CFR 63.107(a), the Permittee shall use the criteria specified in 40 CFR 63.107 to determine whether there are any process vents associated with an air oxidation reactor, distillation unit, or reactor that is in a source subject to 40 CFR Part 63, Subpart F. A process vent is the point of discharge to the atmosphere (or the point of entry into a control device, if any) of a gas stream if the gas stream has the characteristics specified in 40 CFR 63.107(b) through 63.107(h), or meets the criteria specified in 40 CFR 63.107(i).

(b) Pursuant to 40 CFR 63.107(b), some, or all, of the gas stream originates as a continuous flow from an air oxidation reactor, distillation unit, or reactor during operation of the chemical manufacturing process unit.

(c) Pursuant to 40 CFR 63.107(c), the discharge to the atmosphere (with or without passing through a control device) meets at least one of the conditions specified in 40 CFR 63.107(c)(1) through 63.107(c)(3).

(1) Is directly from an air oxidation reactor, distillation unit, or reactor; or

(2) Is from an air oxidation reactor, distillation unit, or reactor after passing solely (i.e., without passing through any other unit operation for a process purpose) through one or more recovery devices within the chemical manufacturing process unit; or

(3) Is from a device recovering only mechanical energy from a gas stream that comes either directly from an air oxidation reactor, distillation unit, or reactor, or from an air oxidation reactor, distillation unit, or reactor after passing solely (i.e., without passing through any other unit operation for a process purpose) through one or more recovery devices within the chemical manufacturing process unit.

(d) Pursuant to 40 CFR 63.107(d), the gas stream contains greater than 0.005 weight percent total organic HAP at the point of discharge to the atmosphere (or at the point of entry into a control device, if any).

(e) Pursuant to 40 CFR 63.107(e), the air oxidation reactor, distillation unit, or reactor is part of a chemical manufacturing process unit that meets the criteria of 40 CFR 63.100(b).

(f) Pursuant to 40 CFR 63.107(f), the gas stream is in the gas phase from the point of origin at the air oxidation reactor, distillation unit, or reactor to the point of discharge to the atmosphere (or to the point of entry into a control device, if any).

(g) Pursuant to 40 CFR 63.107(g), the gas stream is discharged to the atmosphere either on site, off site, or both.

(h) Pursuant to 40 CFR 63.107(h), the gas stream is not any of the items identified in 40 CFR 63.107(h)(1) through 63.107(h)(9).

(1) A relief valve discharge.

(2) A leak from equipment subject to 40 CFR Part 63, Subpart H.

(3) A gas stream going to a fuel gas system as defined in 40 CFR 63.101.

(4) A gas stream exiting a control device used to comply with 40 CFR

(5) A gas stream transferred to other processes (on site or off site) for reaction or other use in another process (i.e., for chemical value as a product, isolated intermediate, byproduct, or coproduct, or for heat value).

(6) A gas stream transferred for fuel value (i.e., net positive heating value), use, reuse, or for sale for fuel value, use, or reuse.

(7) A storage vessel vent or transfer operation vent subject to 40 CFR 63.119 or 63.126.

(8) A vent from a waste management unit subject to 40 CFR 63.132 through 63.137

(9) A gas stream exiting an analyzer
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(i) Pursuant to 40 CFR 63.107(i), the gas stream would meet the characteristics specified in 40 CFR 63.107(b) through 63.107(g), but, for purposes of avoiding applicability, has been deliberately interrupted, temporarily liquefied, routed through any item of equipment for no process purpose, or disposed of in a flare that does not meet the criteria in 40 CFR 63.11(b), or an incinerator that does not reduce emissions of organic HAP by 98 percent or to a concentration of 20 parts per million by volume, whichever is less stringent.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-19]

AA.6 General Compliance, Reporting, and Recordkeeping Provisions [326 IAC 14][40 CFR 63.103, Subpart F]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.103(b), initial performance tests and initial compliance determinations shall be required only as specified in 40 CFR 63, Subparts G and H.

(1) [Applicable under AA.4]

(2) The Permittee shall notify IDEM, OAQ of the intention to conduct a performance test at least 30 calendar days before the performance test is scheduled to allow IDEM, OAQ the opportunity to have an observer present during the test.

(3) [Applicable under AA.4]

(4) [Applicable under AA.4]

(5) Performance tests may be waived with approval of IDEM, OAQ as specified in 40 CFR 63.7(h)(2) of Subpart A. The Permittee of sources subject to 40 CFR Part 63, Subparts F, G, and H who apply for a waiver of a performance test shall submit the application by the dates specified in 40 CFR 63.103(b)(5)(i) rather than the dates specified in 40 CFR 63.7(h)(3) of Subpart A.

(i) If a request is made for an extension of compliance under 40 CFR 63.151(a)(6) or 40 CFR 63.6(i) of Subpart A, the application for a waiver of an initial performance test shall accompany the information required for the request for an extension of compliance. If no extension of compliance is requested, the application for a waiver of an initial performance test shall be submitted no later than 90 calendar days before the Notification of Compliance Status required in 40 CFR 63.152(b) is due to be submitted.

(ii) Any application for a waiver of a performance test shall include information justifying the Permittee request for a waiver, such as the technical or economic infeasibility, or the impracticality, of the source performing the required test.

(6) [Reserved]

(c) Pursuant to 40 CFR 63.103(c), the Permittee of a source subject to 40 CFR Part 63, Subparts F, G, and H shall keep copies of all applicable reports and records required by 40 CFR Part 63, Subparts F, G, and H. If the Permittee submits copies of reports to the applicable EPA Regional Office, the Permittee is not required to maintain copies of reports. If the EPA Regional Office has waived the requirement of 40 CFR 63.10(a)(4)(ii) for submittal of copies of reports, the Permittee is not required to maintain copies of reports.

(1) All applicable records shall be maintained in such a manner that they can be readily accessed. The most recent 6 months of records shall be retained on site or shall be accessible from a central location by computer or other means that provides access within 2 hours after a request. The remaining four and one half years of records may be retained offsite. Records may be maintained in hard copy or computer readable form including, but not limited to, on paper, microfilm, computer, floppy disk, magnetic tape, or microfiche.

(2) The Permittee subject to 40 CFR Part 63, Subparts F, G, and H shall keep the records specified in Paragraph 40 CFR 63.103(c)(2), as well as records specified in 40 CFR Part 63, Subparts G and H.

(i) Records of the occurrence and duration of each start up, shutdown, and malfunction of operation of process equipment or of air pollution control equipment or continuous monitoring systems used to comply with 40 CFR Part 63, Subpart F, Subpart G, or H during which excess emissions (as defined in 40 CFR 63.102(a)(4)) occur.

(ii) For each start up, shutdown, and malfunction during which excess emissions (as defined in 40 CFR 63.102(a)(4)) occur, records that the

procedures specified in the source's start up, shutdown, and malfunction plan were followed, and documentation of actions taken that are not consistent with the plan. For example, if a start up, shutdown, and malfunction plan includes procedures for routing a control device to a backup control device (e.g., the incinerator for a halogenated stream could be routed to a flare during periods when the primary control device is out of service), records must be kept of whether the plan was followed. These records may take the form of a “checklist,” or other form of recordkeeping that confirms conformance with the start up, shutdown, and malfunction plan for the event.

(iii) For continuous monitoring systems used to comply with 40 CFR Part 63, Subpart G, records documenting the completion of calibration checks and maintenance of continuous monitoring systems that are specified in the manufacturer's instructions or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

(3) Records of start up, shutdown and malfunction and continuous monitoring system calibration and maintenance are not required if they pertain solely to Group 2 emission points, as defined in 40 CFR 63.111, that are not included in an emissions average.

(d) Pursuant to 40 CFR 63.103(d), all reports required under 40 CFR Part 63, Subparts F, G, and H shall be sent to IDEM, OAQ and the US EPA at the addresses listed in 40 CFR 63.13 of Subpart A.

(1) Wherever 40 CFR Part 63, Subpart A specifies “postmark” dates, submittals may be sent by methods other than the U.S. Mail (e.g., by fax or courier). Submittals shall be sent on or before the specified date.

(2) If acceptable to IDEM, OAQ, the US EPA, and the Permittee of a source, reports may be submitted on electronic media.

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

AA.7 Heat Exchange System Requirements [326 IAC 14][63.104, Subpart F]

(a) [Applicable under AA.2]

(b) [Applicable under AA.2]

(c) [Applicable under AA.2]

(1) [Applicable under AA.2]

(i) [Applicable under AA.2]

(ii) [Applicable under AA.2]

(iii) [Applicable under AA.2]

(iv) The records will be maintained to document compliance with the 40 CFR 63.104(c) requirements.

(2) [Applicable under AA.2]

(3) [Applicable under AA.2]

(d) [Applicable under AA.2]

(e) [Applicable under AA.2]

(f) (1) Pursuant to 40 CFR 63.104(f)(1), the Permittee shall retain the records identified in 40 CFR 63.104(f)(1)(i) through 63.104(f)(1)(iv) as specified in 40 CFR 63.103(c)(1).

(i) Monitoring data required by 40 CFR 63.104(f) indicating a leak and the date when the leak was detected, and if demonstrated not to be a leak, the basis for that determination;

(ii) Records of any leaks detected by procedures subject to 40 CFR 63.104(c)(2) and the date the leak was discovered;

(iii) The dates of efforts to repair leaks; and

(iv) The method or procedure used to confirm repair of a leak and the date repair was confirmed.

(2) Pursuant to 40 CFR 63.104(f)(2), if the Permittee invokes the delay of repair provisions for a heat exchange system, the following information shall be submitted in the next semi annual periodic report required by 40 CFR 63.152(c). If the leak remains unrepaired, the information shall also be submitted in each subsequent periodic report, until repair of the leak is reported.

(i) The Permittee shall report the presence of the leak and the date that the leak was detected.

(ii) The Permittee shall report whether or not the leak has been repaired.

(iii) The Permittee shall report the reason(s) for delay of repair. If delay of repair is invoked due to the reasons described in 40 CFR 63.104(e)(2), documentation of emissions estimates must also be submitted.

(iv) If the leak remains unrepaired, the Permittee shall report the expected date of repair.

(v) If the leak is repaired, the Permittee shall report the date the leak was successfully repaired.

AA.8 Maintenance Wastewater Requirements [326 IAC 14][40 CFR 63.105, Subpart F]

(a) [Applicable under Condition AA.3]

(b) Pursuant to 40 CFR 63.105(b), the Permittee shall prepare a description of maintenance procedures for management of wastewaters generated from the emptying and purging of equipment in the process during temporary shutdowns for inspections, maintenance, and repair (i.e., a maintenance turnaround) and during periods which are not shutdowns (i.e., routine maintenance). The descriptions shall:

(1) Specify the process equipment or maintenance tasks that are anticipated to create wastewater during maintenance activities.

(2) Specify the procedures that will be followed to properly manage the wastewater and control organic HAP emissions to the atmosphere; and

(3) Specify the procedures to be followed when clearing materials from process equipment.

(c) Pursuant to 40 CFR 63.105(c), the Permittee shall modify and update the information required by 40 CFR 63.105(b) as needed following each maintenance procedure based on the actions taken and the wastewaters generated in the preceding maintenance procedure.

(d) [Applicable under Condition AA.3]

(e) Pursuant to 40 CFR 63.105(e), the Permittee shall maintain a record of the information required by 40 CFR 63.105(b) and 63.105(c) as part of the start up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3) of Subpart A.

SECTION BB 40 CFR 63, Subpart G--National Emission Standards for Organic Hazardous Air Pollutants From the Synthetic Organic Chemical Manufacturing Industry for Process Vents, Storage Vessels, Transfer Operations, and Wastewater

Definitions contained in 40 CFR Part 63, Subpart G, Section 111 are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2-7-5(1)]

BB.1 Emission Standard. [326 IAC 20-11] [40 CFR 63.112, Subpart G]

(a) Pursuant to 40 CFR 63.112(a), the Permittee of an existing source subject to the requirements of 40 CFR Part 63, Subpart G shall control emissions of organic HAP's to the level represented by the following equation:

$$E_A = 0.02\Sigma\ EPV_1 + \Sigma\ EPV_2 + 0.05\Sigma\ ES_1 + \Sigma\ ES_2 + 0.02\Sigma\ ETR_1 + \Sigma\ ETR_2 + \Sigma\ EWW_{1C} + \Sigma\ EWW_2$$

where:

EA = Emission rate, megagrams per year, allowed for the source.

0.02 ∑ EPV1 = Sum of the residual emissions, megagrams per year, from all Group 1 process vents, as defined in 40 CFR 63.111.

∑ EPV2 = Sum of the emissions, megagrams per year, from all Group 2 process vents as defined in 40 CFR 63.111.

0.05 ∑ ES1 = Sum of the residual emissions, megagrams per year, from all Group 1 storage vessels, as defined in 40 CFR 63.111.

∑ ES2 = Sum of the emissions, megagrams per year, from all Group 2 storage vessels, as defined in 40 CFR 63.111.

0.02 ∑ ETR1 = Sum of the residual emissions, megagrams per year, from all Group 1 transfer racks, as defined in 40 CFR 63.111.

∑ ETR2 = Sum of the emissions, megagrams per year, from all Group 2 transfer racks, as defined in 40 CFR 63.111.

∑ EWW1C = Sum of the residual emissions from all Group 1 wastewater streams, as defined in 40 CFR 63.111. EWW1C is calculated for each Group 1 stream according to the equation for EWW1C in 40 CFR 63.150(g)(5)(i)

∑ EWW2 = Sum of emissions from all Group 2 wastewater streams, as defined in 40 CFR 63.111.

The emissions level represented by the equation specified in 40 CFR 63.112(a) is dependent on the collection of emission points in the source. The level is not fixed and can change as the emissions from each emission point change or as the number of emission points in the source changes.

(b) [Reserved]

(c) Pursuant to 40 CFR 63.112(c), the Permittee of an existing source shall demonstrate compliance with the emission standard in 40 CFR 63.112(a) by following the procedures specified in 40 CFR 63.112(e) for all emission points, or by following the emissions averaging compliance approach specified in 40 CFR 63.112(f) for some emission points and the procedures specified in 40 CFR 63.112(e) for all other emission points within the source.

(d) [Reserved]

(e) Pursuant to 40 CFR 63.112(e), the Permittee of an existing or new source may comply with the process vent provisions in 40 CFR 63.113 through 63.118, the storage vessel provisions in 40 CFR 63.119 through 63.123, the transfer operation provisions in 40 CFR 63.126 through 63.130, the wastewater provisions in 40 CFR 63.131 through 63.147, the leak inspection provisions in 40 CFR 63.148, and the provisions in 40 CFR 63.149.

(1) The Permittee using this compliance approach shall also comply with the requirements of 40 CFR 63.151 and 63.152, as applicable.

(2) The Permittee using this compliance approach is not required to calculate the annual emission rate specified in 40 CFR 63.112(a).

(3) When emissions of different kinds (e.g., emissions from process vents, transfer operations, storage vessels, process wastewater, and/or in-process equipment subject to 40 CFR 63.149) are combined, and at least one of the emission streams would be classified as Group 1 in the absence of combination with other emission streams, the Permittee shall comply with the requirements of either 40 CFR 63.112(e)(3)(i) or 63.112(e)(3)(ii).

(i) Comply with the applicable requirements of 40 CFR Part 63, Subpart G for each kind of emissions in the stream (e.g., the requirements in 40 CFR 63.113 through 63.118 for process vents, and the requirements of 40 CFR 63.126 through 63.130 for transfer operations); or

(ii) Comply with the first set of requirements identified in 40 CFR 63.112(e)(3)(ii)(A) through 63.112(e)(3)(ii)(E) which applies to any individual emission stream that is included in the combined stream, where either that emission stream would be classified as Group 1 in the absence of combination with other emission streams, or the Permittee chooses to consider that emission stream to be Group 1 for purposes of 40 CFR 63.112(e)(3)(ii). Compliance with the first applicable set of requirements identified in 40 CFR 63.112(e)(3)(ii)(A) through 63.112(e)(3)(ii)(E) constitutes compliance with all other requirements in 40 CFR 63.112(e)(3)(ii)(A) through 63.112(e)(3)(ii)(E) applicable to other types of emissions in the combined stream.

(A) The requirements of 40 CFR Part 63, Subpart G for Group 1 process vents, including applicable monitoring, recordkeeping, and reporting;

(B) The requirements of 40 CFR Part 63, Subpart G for Group 1 transfer racks, including applicable monitoring, recordkeeping, and reporting;

(C) The requirements of 40 CFR 63.119(e) for control of emissions from Group 1 storage vessels, including monitoring, recordkeeping, and reporting;

(D) The requirements of 40 CFR 63.139 for control devices used to control emissions from waste management units, including applicable monitoring, recordkeeping, and reporting; or

(E) The requirements of 40 CFR 63.139 for closed vent systems for control of emissions from in-process equipment subject to 40

CFR 63.149, including applicable monitoring, recordkeeping, and reporting.

(f) Pursuant to 40 CFR 63.112(f), the Permittee of an existing source may elect to control some of the emission points within the source to different levels than specified under 40 CFR 63.113 through 63.148 by using an emissions averaging compliance approach as long as the overall emissions for the source do not exceed the emission level specified in 40 CFR 63.112(a). The Permittee using emissions averaging must meet the requirements in 40 CFR 63.112(f)(1) and 63.112(f)(2).

(1) Calculate emission debits and credits for those emission points involved in the emissions average as specified in 40 CFR 63.150; and

(2) Comply with the requirements of 40 CFR 63.151 and 63.152, as applicable.

(g) [Reserved]

(h) [Reserved]

BB.2 Process Vent Provisions - Reference Control Technology. [326 IAC 20-11] [63.113, Subpart G]

(a) Pursuant to 40 CFR 63.113(a), the Permittee of a Group 1 process vent as defined in 40 CFR Part 63, Subpart G shall comply with the requirements of, 63.113(a)(2).

(1) [Reserved]

(2) Pursuant to 40 CFR 63.113(a)(2), the Permittee shall reduce emissions of total organic hazardous air pollutants by 98 weight-percent or to a concentration of 20 parts per million by volume, whichever is less stringent. For combustion devices, the emission reduction or concentration shall be calculated on a dry basis, corrected to 3-percent oxygen.

(i) Compliance with 40 CFR 63.113(a)(2) may be achieved by using any combination of combustion, recovery, and/or recapture devices, except that a recovery device may not be used to comply with 40 CFR 63.113(a)(2) by reducing emissions of total organic hazardous air pollutants by 98 weight-percent.

(ii) [Reserved]

(3) [Reserved]

(b) Pursuant to 40 CFR 63.113(b), if a boiler or process heater is used to comply with the percent reduction requirement or concentration limit specified in paragraph (a)(2) of this section, then the vent stream shall be introduced into the flame zone of such a device.

(c) [Reserved]

(d) Pursuant to 40 CFR 63.113(d), the Permittee of a Group 2 process vent, having a flow rate greater than or equal to 0.005 standard cubic meter per minute, a HAP concentration greater than or equal to 50 parts per million by volume, and a TRE index value greater than 1.0 but less than or equal to 4.0 shall maintain a TRE index value greater than 1.0 and shall comply with the monitoring of recovery device parameters in 40 CFR 63.114(b), the TRE index calculations of 40 CFR 63.115, and the applicable reporting and recordkeeping provisions of 40 CFR 63.117 and 63.118. Such Permittee is not subject to any other provisions of 40 CFR 63.114 through 63.118.

(e) Pursuant to 40 CFR 63.113(e), the Permittee of the Group 2 process vent with a TRE index value greater than 4.0 shall maintain a TRE index value greater than 4.0, comply

with the provisions for calculation of a TRE index value in 40 CFR 63.115 and the reporting and recordkeeping provisions in 40 CFR 63.117(b), 63.118(c), and 63.118(h) and is not subject to monitoring or any other provisions of 40 CFR 63.114 through 63.118.

(f) Pursuant to 40 CFR 63.113(f), the Permittee of the Group 2 process vent with a flow rate less than 0.005 standard cubic meter per minute shall maintain a flow rate less than 0.005 standard cubic meter per minute; comply with the Group determination procedures in 40 CFR 63.115(a), 63.115(b), and 63.115(e); and the reporting and recordkeeping requirements in 40 CFR 63.117(c), and 40 CFR 63.118(d) and 63.118(i); and is not subject to monitoring or any other provisions of 40 CFR 63.114 through 63.118.

(g) [Reserved]

(h) Pursuant to 40 CFR 63.113(h), the Permittee of a process vent complying with 40 CFR 63.113(a)(2) is not required to perform the group determination described in 40 CFR 63.115.

(i) [Reserved]

BB.3 Process Vent Provisions - Monitoring Requirements. [326 IAC 20-11] [40 CFR 63.114, Subpart G]

(a) Pursuant to 40 CFR 63.114(a), the Permittee who owns a process vent that uses a combustion device to comply with the requirements in 63.113(a)(2), shall install monitoring equipment specified in 40 CFR 63.114(a)(1), 63.114(a)(2), 63.114(a)(3), 63.114(a)(4), or 63.114(a)(5), depending on the type of device used. All monitoring equipment shall be installed, calibrated, maintained, and operated according to manufacturer's specifications or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

(1) Where an incinerator is used, a temperature monitoring device equipped with a continuous recorder is required.

(i) Where an incinerator other than a catalytic incinerator is used, a temperature monitoring device shall be installed in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.

(ii) Where a catalytic incinerator is used, temperature monitoring devices shall be installed in the gas stream immediately before and after the catalyst bed.

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(b) Pursuant to 40 CFR 63.114(b), the Permittee that owns a process vent with a TRE index value greater than 1.0 as specified under 40 CFR 63.113(a)(3) or 63.113(d) that uses one or more recovery devices shall install either an organic monitoring device equipped with a continuous recorder or the monitoring equipment specified in 40 CFR 63.114(b)(1), 63.114(b)(2), or 63.114(b)(3), depending on the type of recovery device used. All monitoring equipment shall be installed, calibrated, and maintained according to the manufacturer's specifications or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

Monitoring is not required for process vents with TRE index values greater than 4.0 as specified in 40 CFR 63.113(e).

(1) Where an absorber is the final recovery device in the recovery system, a scrubbing liquid temperature monitoring device and a specific gravity monitoring device, each equipped with a continuous recorder shall be used;

(2) Where a condenser is the final recovery device in the recovery system, a condenser exit (product side) temperature monitoring device equipped with a continuous recorder shall be used;

(3) Where a carbon adsorber is the final recovery device in the recovery system, an integrating regeneration stream flow monitoring device having an accuracy of ±10 percent or better, capable of recording the total regeneration stream mass or volumetric flow for each regeneration cycle; and a carbon bed temperature monitoring device, capable of recording the carbon bed temperature after each regeneration and within 15 minutes of completing any cooling cycle shall be used.

(c) [Reserved]

(d) Pursuant to 40 CFR 63.114(d), the Permittee who owns a process vent shall comply with 40 CFR 63.114(d)(1) or 63.114(d)(2) for any bypass line between the origin of the gas stream (i.e., at an air oxidation reactor, distillation unit, or reactor as identified in 40 CFR 63.107(b)) and the point where the gas stream reaches the process vent, as described in 40 CFR 63.107, that could divert the gas stream directly to the atmosphere. Equipment such as low leg drains, high point bleeds, analyzer vents, open-ended valves or lines, and pressure relief valves needed for safety purposes are not subject to 40 CFR 63.114(d).

(1) Properly install, maintain, and operate a flow indicator that takes a reading at least once every 15 minutes. Records shall be generated as specified in 40 CFR 63.118(a)(3). The flow indicator shall be installed at the entrance to any bypass line that could divert the gas stream to the atmosphere; or

(2) Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. A visual inspection of the seal or closure mechanism shall be performed at least once every month to ensure that the valve is maintained in the non-diverting position and the gas stream is not diverted through the bypass line.

(e) Pursuant to 40 CFR 63.114(e), the Permittee shall establish a range that indicates proper operation of the control or recovery device for each parameter monitored under 40 CFR 63.114(a) and 63.114(b). In order to establish the range, the information required in 40 CFR 63.152(b) shall be submitted in the Notification of Compliance Status or the operating permit application or amendment. The range may be based upon a prior performance test conducted for determining compliance with a regulation promulgated by the EPA, and the Permittee is not required to conduct a performance test under 40 CFR 63.116, if the prior performance test was conducted using the same methods specified in 40 CFR 63.116 and either no process changes have been made since the test, or the Permittee can demonstrate that the results of the performance test, with or without adjustments, reliably demonstrate compliance despite process changes.

BB.4 Process Wastewater Provisions - General. [326 IAC 12] [40 CFR 63.132, Subpart G]

(a) Pursuant to 40 CFR 63.132(a), requirements applicable to process wastewater streams located at existing sources are specified. The Permittee shall comply with the requirements in 40 CFR 63.132(a)(1) through 63.132(a)(3).

(1) Determine wastewater streams to be controlled for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G]. Determine whether each wastewater stream requires control for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] by complying with the requirements in either 40 CFR 63.132(a)(1)(i), and comply with the requirements in 40 CFR 63.132(a)(1)(iii).

(i) Comply with 40 CFR 63.132(c), determining whether the wastewater stream is Group 1 or Group 2 for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G]; or

(ii) [Reserved]

(iii) Comply with 40 CFR 63.132(f).

(2) [Reserved]

(3) Requirements for Group 2 wastewater streams. For wastewater streams that are Group 2 for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G], comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 63.147(b)(8).

(b) [Reserved]

(c) [Applicable under BB.7]

(d) [Reserved]

(e) [Reserved]

(f) Pursuant to 40 CFR 63.132(f), the Permittee shall not discard liquid or solid organic materials with a concentration of greater than 10,000 parts per million of Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. This prohibition does not apply to materials from the activities listed in 40 CFR 63.132(f)(1) through 63.132(f)(4).

(1) Equipment leaks;

(2) Activities included in maintenance or startup/shutdown/malfunction plans;

(3) Spills; or

(4) Samples of a size not greater than reasonably necessary for the method of analysis that is used.

(g) [Reserved]

BB.5 Emissions Averaging Provisions. [326 IAC 20-11] [40 CFR 63.150, Subpart G]

(a) Pursuant to 40 CFR 63.150(a), the Permittee who seeks to comply with the emission standard in 40 CFR 63.112(a) by using emissions averaging according to 40 CFR 63.112(f) rather than following the provisions of 40 CFR 63.113 through 63.148. Notwithstanding the definition of process vent in 40 CFR 63.101 and the sampling site designation in 40 CFR 63.115(a), for purposes of 40 CFR 63.150(a) the location of a process vent shall be defined, and the characteristics of its gas stream shall be determined, consistent with 40 CFR 63.150(g)(2)(i).

(b) [Reserved]

(c) Pursuant to 40 CFR 63.150(c), the following emission points can be used to generate emissions averaging credits, if control was applied after November 15, 1990 and if sufficient information is available to determine the appropriate value of credits for the emission point:

(1) Group 2 emission points.

(2) [Reserved]

(3) [Reserved]

(d) [Reserved]

(e) [Applicable under BB.15]

(f) [Applicable under BB.9]

(g) [Applicable under BB.9]

(h) [Applicable under BB.9]

(i) [Reserved]

(j) [Reserved]

(k) Pursuant to 40 CFR 63.150(k), the Permittee must demonstrate that the emissions from the emission points proposed to be included in the average will not result in greater hazard than if the emission points were controlled according to the provisions in 40 CFR 63.113 through 63.148.

(1) This demonstration of hazard or risk equivalency shall be made to the satisfaction of IDEM, OAQ.

(i) IDEM, OAQ may require Permittee to use specific methodologies and procedures for making a hazard or risk determination.

(ii) The demonstration and approval of hazard or risk equivalency shall be made according to any guidance that IDEM, OAQ makes available for use.

(2) The Permittee shall provide documentation demonstrating the hazard or risk equivalency of their proposed emissions average in their operating permit application or in their Implementation Plan if an operating permit application has not yet been submitted.

(3) An emissions averaging plan that does not demonstrate hazard or risk equivalency to the satisfaction of IDEM, OAQ shall not be approved. IDEM, OAQ may require such adjustments to the emissions averaging plan as are necessary in order to ensure that the average will not result in greater hazard or risk to human health or the environment than would result if the emission points were controlled according to 40 CFR 63.113 through 63.148.

(4) A hazard or risk equivalency demonstration must:

(i) Be a quantitative, bona fide chemical hazard or risk assessment;

(ii) Account for differences in chemical hazard or risk to human health or the environment; and

(iii) Meet any requirements set by IDEM, OAQ for such demonstrations.

(l) [Reserved]

(m) Pursuant to 40 CFR 63.150(m), for each Group 1 or Group 2 emission point included in an emissions average, the Permittee shall perform testing, monitoring, recordkeeping, and reporting equivalent to that required for Group 1 emission points complying with 40 CFR 63.113 through 63.148. The specific requirements for process vents, storage vessels, transfer racks, and wastewater are identified in 40 CFR 63.150(m)(1) through 63.150(m)(6).

(1) The source shall implement the following testing, monitoring, recordkeeping, and reporting procedures for each process vent equipped with a flare, incinerator, boiler, or process heater.

(i) Determine, consistent with 40 CFR 63.150(g)(2)(i), whether the process vent is Group 1 or Group 2 according to the procedures in 40 CFR 63.115;

(ii) [Reserved]

(iii) Monitor the operating parameters, keep records, and submit reports specified in 40 CFR 63.114, 63.117(a), 63.118(a), 63.118(f), and 63.118(g), as appropriate for the specific control device.

(2) The source shall implement the following procedures for each process vent equipped with a carbon adsorber, absorber, or condenser but not equipped with a control device:

(i) Determine, consistent with 40 CFR 63.150(g)(2)(i), the flow rate, organic HAP concentration, and TRE index value using the methods specified in 40 CFR 63.115;

(ii) Monitor the operating parameters, keep records, and submit reports specified in 40 CFR 63.114, 63.117(a), 63.118(a), 63.118(f), and 63.118(g), as appropriate for the specific recovery device.

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(6) [Reserved]

(n) [Applicable under BB.15]

(o) [Applicable under BB.15]

Compliance Determination Requirements

BB.6 Process Vent Provisions - Methods and Procedures for Process Vent Group Determination. [326 IAC 20-11] [40 CFR 63.115, Subpart G]

(a) Pursuant to 40 CFR 63.115(a), for purposes of determining vent stream flow rate, total organic HAP or total organic carbon concentration or TRE index value, as specified under

40 CFR 63.115(b), 63.115(c), or 63.115(d) the sampling site shall be after the last recovery device (if any recovery devices are present) but prior to the inlet of any control device that is present and prior to release to the atmosphere.

(1) Method 1 or 1A of 40 CFR Part 60, Appendix A, as appropriate, shall be used for selection of the sampling site.

(2) No traverse site selection method is needed for vents smaller than 0.10 meter in diameter.

(b) Pursuant to 40 CFR 63.115(b), to demonstrate that a vent stream flow rate is less than 0.005 standard cubic meter per minute in accordance with the Group 2 process vent definition of 40 CFR Part 63, Subpart G, the Permittee shall measure flow rate by the following procedures:

(1) The sampling site shall be selected as specified in 40 CFR 63.115(a).

(2) The gas volumetric flow rate shall be determined using Method 2, 2A, 2C, or 2D of 40 CFR Part 60, Appendix A, as appropriate.

(c) Pursuant to 40 CFR 63.115(c), the Permittee seeking to demonstrate that a vent stream has an organic HAP concentration below 50 parts per million by volume in accordance with the Group 2 process vent definition of 40 CFR 63, Subpart G shall measure either total organic HAP or TOC concentration using the following procedures:

(1) The sampling site shall be selected as specified in 40 CFR 63.115(a).

(2) Method 18 or Method 25A of 40 CFR part 60, appendix A shall be used to measure concentration; alternatively, any other method or data that has been validated according to the protocol in Method 301 of appendix A of this part may be used.

(3) Where Method 18 of 40 CFR part 60, appendix A is used, the following procedures shall be used to calculate parts per million by volume concentration:

(i) The minimum sampling time for each run shall be 1 hour in which either an integrated sample or four grab samples shall be taken. If grab sampling is used, then the samples shall be taken at approximately equal intervals in time, such as 15 minute intervals during the run.

(ii) The concentration of either TOC (minus methane and ethane) or organic HAP shall be calculated according to 40 CFR 63.115(c)(3)(ii)(A) or (c)(3)(ii)(B) as applicable.

(A) The TOC concentration (CTOC) is the sum of the concentrations of the individual components and shall be computed for each run using the following equation:

$$C_{TOC} = \frac{\sum_{i-1}^{x}\left(\sum_{j-1}^{x} C_{ji}\right)}{X}$$

where:

CTOC = Concentration of TOC (minus methane and ethane), dry basis, parts per million by volume.

Cji	=	Concentration of sample component j of the sample i, dry basis, parts per million by volume.
n	=	Number of components in the sample.
x	=	Number of samples in the sample run.

(B) The total organic HAP concentration (CHAP) shall be computed according to the equation in 40 CFR 63.115(c)(3)(ii)(A) except that only the organic HAP species shall be summed. The list of organic HAP's is provided in table 2 of 40 CFR 63, Subpart F.

(4) Where Method 25A of 40 CFR part 60, appendix A is used, the following procedures shall be used to calculate parts per million by volume TOC concentration:

(i) Method 25A of 40 CFR part 60, appendix A, shall be used only if a single organic HAP compound is greater than 50 percent of total organic HAP, by volume, in the vent stream.

(ii) The vent stream composition may be determined by either process knowledge, test data collected using an appropriate EPA method, or a method or data validated according to the protocol in Method 301 of appendix A of this part. Examples of information that could constitute process knowledge include calculations based on material balances, process stoichiometry, or previous test results provided the results are still relevant to the current vent stream conditions.

(iii) The organic HAP used as the calibration gas for Method 25A of 40 CFR part 60, appendix A shall be the single organic HAP compound present at greater than 50 percent of the total organic HAP by volume.

(iv) The span value for Method 25A of 40 CFR part 60, appendix A shall be 50 parts per million by volume.

(v) Use of Method 25A of 40 CFR part 60, appendix A is acceptable if the response from the high-level calibration gas is at least 20 times the standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(vi) The Permittee shall demonstrate that the concentration of TOC including methane and ethane measured by Method 25A of 40 CFR part 60, appendix A is below 25 parts per million by volume to be considered a Group 2 vent with an organic HAP concentration below 50 parts per million by volume and to qualify for the low concentration exclusion in 40 CFR 63.113(g).

(d) Pursuant to 40 CFR 63.115(d), to determine the TRE index value, the Permittee shall conduct a TRE determination and calculate the TRE index value according to the procedures in 40 CFR 63.115(d)(1) or 63.115(d)(2) and the TRE equation in 40 CFR 63.115(d)(3).

(1) Engineering assessment may be used to determine vent stream flow rate, net heating value, TOC emission rate, and total organic HAP emission rate for the representative operating condition expected to yield the lowest TRE index value.

(i) If the TRE value calculated using such engineering assessment and the TRE equation in 40 CFR 63.115(d)(3) is greater than 4.0, then the Permittee is not required to perform the measurements specified in 40 CFR 63.115(d)(2).

(ii) If the TRE value calculated using such engineering assessment and the TRE equation in 40 CFR 63.115(d)(3) is less than or equal to 4.0, then the Permittee is required to perform the measurements specified in 40 CFR 63.115(d)(2) for group determination or consider the process vent a Group 1 vent and comply with the emission reduction specified in 40 CFR 63.113(a).

(iii) Engineering assessment includes, but is not limited to, the following:

(A) Previous test results provided the tests are representative of current operating practices at the process unit.

(B) Bench-scale or pilot-scale test data representative of the process under representative operating conditions.

(C) Maximum flow rate, TOC emission rate, organic HAP emission rate, or net heating value limit specified or implied within a permit limit applicable to the process vent.

(D) Design analysis based on accepted chemical engineering principles, measurable process parameters, or physical or chemical laws or properties. Examples of analytical methods include, but are not limited to:

(1) Use of material balances based on process stoichiometry to estimate maximum organic HAP concentrations,

(2) Estimation of maximum flow rate based on physical equipment design such as pump or blower capacities,

(3) Estimation of TOC or organic HAP concentrations based on saturation conditions,

(4) Estimation of maximum expected net heating value based on the vent stream concentration of each organic compound or, alternatively, as if all TOC in the vent stream were the compound with the highest heating value.

(E) All data, assumptions, and procedures used in the engineering assessment shall be documented.

(2) Except as provided in 40 CFR 63.115(d)(1), vent stream flow rate, net heating value, TOC emission rate, and total organic HAP emission rate shall be measured and calculated according to the procedures in 40 CFR 63.115(d)(2)(i) through 63.115(d)(2)(v) and used as input to the TRE index value calculation in 40 CFR 63.115(d)(3).

(i) The vent stream volumetric flow rate (Qs), in standard cubic meters per minute at 20 degrees Celcius, shall be determined using Method 2, 2A, 2C, or 2D of 40 CFR Part 60, Appendix A, as appropriate. If the vent stream tested passes through a final steam jet ejector and is not condensed, the vent stream volumetric flow shall be corrected to 2.3 percent moisture.

(ii) The molar composition of the vent stream, which is used to calculate net heating value, shall be determined using the following methods:

(A) Method 18 of 40 CFR Part 60, Appendix A to measure the concentration of each organic compound.

(B) American Society for Testing and Materials D1946–77 to measure the concentration of carbon monoxide and hydrogen.

(C) Method 4 of 40 CFR Part 60, Appendix A, to measure the moisture content of the vent stream.

(iii) The net heating value of the vent stream shall be calculated using the following equation:

$$H_T = K_1 \left(\sum_{j=1}^{n} C_j H_j \right) \left(1 - B_{ws} \right)$$

where:

HT = Net heating value of the sample, megaJoule per standard cubic meter, where the net enthalpy per mole of vent stream is based on combustion at 25℃ and 760 millimeters of mercury, but the standard temperature for determining the volume corresponding to one mole is 20 ℃, as in the definition of Qs (vent stream flow rate).

Kl = Constant, 1.740×10-7 (parts per million)-1 (gram-mole per standard cubic meter) (megaJoule per kilocalorie), where standard temperature for (gram-mole per standard cubic meter) is 20℃.

Bws = Water vapor content of the vent stream, proportion by volume; except that if the vent stream passes through a final steam jet and is not condensed, it shall be assumed that

Bws = 0.023 in order to correct to 2.3 percent moisture.

Cj = Concentration on a dry basis of compound j in parts per million, as measured for all organic compounds by Method 18 of 40 CFR Part 60, Appendix A and measured for hydrogen and carbon monoxide by American Society for Testing and Materials D1946–77 as indicated in 40 CFR 63.115(d)(2)(ii).

Hj = Net heat of combustion of compound j, kilocalorie per gram-mole, based on combustion at 25℃ and 760 millimeters mercury. The heats of combustion of vent stream components shall be determined using American Society for Testing and Materials D2382–76 if published values are not available or cannot be calculated.

(iv) The emission rate of TOC (minus methane and ethane) (ETOC) and the emission rate of total organic HAP (EHAP) in the vent stream shall both be calculated using the following equation:

$$E = K_2 \left[\sum_{j=1}^{n} C_j M_j \right] Q_s$$

where:

E = Emission rate of TOC (minus methane and ethane) or emission rate of total organic HAP in the sample, kilograms per hour.

K2 = Constant, 2.494×10-6 (parts per million)-1 (gram-mole per standard cubic meter) (kilogram/gram) (minutes/hour), where standard temperature for (gram-mole per standard cubic meter) is 20°C.
Cj = Concentration on a dry basis of organic compound j in parts per million as measured by Method 18 of 40 CFR Part 60, Appendix A as indicated in 40 CFR 63.115(d)(2)(ii). If the TOC emission rate is being calculated, Cj includes all organic compounds measured minus methane and ethane; if the total organic HAP emission rate is being calculated, only organic HAP compounds listed in Table 2 of 40 CFR Part 63, Subpart F are included.

Mj = Molecular weight of organic compound j, gram/gram-mole.

Qs = Vent stream flow rate, dry standard cubic meter per minute, at a temperature of 20°C.

(v) [Reserved]

(3) The Permittee shall calculate the TRE index value of the vent stream using the equations and procedures in 40 CFR 63.115(d)(3).

(i) The equation for calculating the TRE index for a vent stream controlled by a flare or incinerator is as follows:

$$TRE = \frac{1}{E_{HAP}}\left[a + b(Q_s) + c(H_T) + d(E_{TOC})\right]$$

where:

TRE = TRE index value.

EHAP = Hourly emission rate of total organic HAP, kilograms per hour, as calculated in 40 CFR 63.115(d)(1) or 63.115(d)(2)(iv).

Qs = Vent stream flow rate, standard cubic meters per minute, at a standard temperature of 20°C, as calculated in 40 CFR 63.115(d)(1) or 63.115(d)(2)(i).

HT = Vent stream net heating value, megaJoules per standard cubic meter, as calculated in 40 CFR 63.115(d)(1) or 63.115(d)(2)(iii).

ETOC = Emission rate of TOC (minus methane and ethane), kilograms per hour, as calculated in 40 CFR 63.115(d)(1) or 63.115(d)(2)(iv).

a,b,c,d = Coefficients presented in Table 1 of 40 CFR Part 63, Subpart G, selected in accordance with 63.115(d)(3)(ii) and 63.115(d)(3)(iii).

(ii) The Permittee of a nonhalogenated vent stream shall calculate the TRE index value based on the use of a flare, a thermal incinerator with 0 percent heat recovery, and a thermal incinerator with 70 percent heat recovery and shall select the lowest TRE index value. The Permittee shall use the applicable coefficients in Table 1 of 40 CFR Part 63,

Subpart G for nonhalogenated vent streams located within existing sources and the applicable coefficients in Table 2 of 40 CFR Part 63, Subpart G for nonhalogenated vent streams located within new sources.

(iii) [Reserved]

(e) Pursuant to 40 CFR 63.115(e), the Permittee of a Group 2 process vent shall recalculate the TRE index value, flow, or organic hazardous air pollutants concentration for each process vent, as necessary to determine whether the vent is Group 1 or Group 2, whenever process changes are made that could reasonably be expected to change the vent to a Group 1 vent. Examples of process changes include, but are not limited to, changes in production capacity, production rate, feedstock type, or catalyst type, or whenever there is replacement, removal, or addition of recovery equipment. For purposes of 40 CFR 63.115(e), process changes do not include: Process upsets; unintentional, temporary process changes; and changes that are within the range on which the original TRE calculation was based.

(1) The TRE index value, flow rate, or organic HAP concentration shall be recalculated based on measurements of vent stream flow rate, TOC, and organic HAP concentrations, and heating values as specified in 40 CFR 63.115(a), 63.115(b), 63.115(c), and 63.115(d), as applicable, or on best engineering assessment of the effects of the change. Engineering assessments shall meet the specifications in 40 CFR 63.115(d)(1).

(2) [Applicable under BB.10]

(f) Pursuant to 40 CFR 63.115(f), notwithstanding any other provisions of 40 CFR 63, Subpart G, in any case where a process vent includes one or more gas streams that are not from a source subject to 40 CFR 63, Subpart G (hereafter called “non-HON streams” for purposes of this paragraph), and one or more gas streams that meet the criteria in 40 CFR 63.107(b) through (h) or the criteria in 40 CFR 63.107(i) (hereafter called “HON streams” for purposes of this paragraph), the Permittee may elect to comply with paragraphs 40 CFR 63.115(f)(1) through (3).

(1) The Permittee may determine the characteristics (flow rate, total organic HAP concentration, and TRE index value) for each HON stream, or combination of HON streams, at a representative point as near as practical to, but before, the point at which it is combined with one or more non-HON streams.

(2) If one or more of the HON streams, or combinations of HON streams, has the characteristics (determined at the location specified in 40 CFR 63.115(f)(1)) associated with a Group 1 process vent, the combined vent stream is a Group 1 process vent. Except as specified in 40 CFR 64.115(f)(3), if none of the HON streams, or combinations of HON streams, when determined at the location specified in 40 CFR 63.115(f)(1), has the characteristics associated with a Group 1 process vent, the combined vent stream is a Group 2 process vent regardless of the TRE index value determined at the location specified in 40 CFR 63.115(a). If the combined vent stream is a Group 2 process vent as determined by the previous sentence, but one or more of the HON streams, or combinations of HON streams, has a TRE index value greater than 1 but less than or equal to 4, the combined vent stream is a process vent with a TRE index value greater than 1 but less than or equal to 4. In this case, the Permittee shall monitor the combined vent stream as required by 40 CFR 63.114(b).

(3) 40 CFR 63.115(f)(1) and (2) are not intended to apply instead of any other subpart of 40 CFR 63. If another subpart of 40 CFR 63 applies to one or more of the non-HON streams contributing to the combined vent stream, that subpart may impose emission control requirements such as, but not limited to, requiring

the combined vent stream to be classified and controlled as a Group 1 process vent.

BB.7 Process Wastewater Provisions - General. [326 IAC 12] [40 CFR 63.132, Subpart G]

(a) [Applicable under BB.4]

(b) [Reserved]

(c) Pursuant to 40 CFR 63.132(c), the Permittee shall determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G]. Total annual average concentration shall be determined according to the procedures specified in 40 CFR 63.144(b). Annual average flow rate shall be determined according to the procedures specified in 40 CFR 63.144(c).

(1) A wastewater stream is a Group 1 wastewater stream for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] if:

(i) The total annual average concentration of Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] is greater than or equal to 10,000 parts per million by weight at any flow rate; or

(ii) The total annual average concentration of Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] is greater than or equal to 1,000 parts per million by weight and the annual average flow rate is greater than or equal to 10 liters per minute.

(2) A wastewater stream is a Group 2 wastewater stream for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] if it is not a Group 1 wastewater stream for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] by the criteria in 40 CFR 63.132(c)(1) .

(d) [Reserved]

(e) [Reserved]

(f) [Applicable under BB.4]

(g) [Reserved]

BB.8 Process Wastewater Provisions - Test Methods and Group Determination. [326 IAC 12] [40 CFR 63.144, Subpart G]

(a) Pursuant to 40 CFR 63.144(a), procedures to determine applicability. A Permittee shall comply with 40 CFR 63.144(a)(1) or 63.144(a)(2) for each wastewater stream to determine which wastewater streams require control for Table 8 and/or Table 9 compounds [Tables found in 40 CFR Part 63, Subpart G]. The Permittee may use a combination of the approaches in 40 CFR 63.144(a)(1) and 63.144(a)(2) for different wastewater streams generated at the source.

(1) Determine Group 1 or Group 2 status. Determine whether a wastewater stream is a Group 1 or Group 2 wastewater stream in accordance with 40 CFR 63.144(b) and 63.144(c).

(2) Designate as Group 1. A Permittee may designate as a Group 1 wastewater stream a single wastewater stream or a mixture of wastewater streams. The Permittee is not required to determine the concentration or flow rate for each designated Group 1 wastewater stream for the purposes of 40 CFR 63.144.

(b) Pursuant to 40 CFR 63.144(b), procedures to establish concentrations, when determining Group status under 40 CFR 63.144(a)(1). A Permittee who elects to comply with the requirements of 40 CFR 63.144(a)(1) shall determine the annual average concentration for Table 8 and/or Table 9 compounds [Tables found in 40 CFR Part 63, Subpart G] according to 40 CFR 63.144(b)(1) for existing sources. The annual average concentration shall be a flow weighted average representative of actual or anticipated operation of the chemical manufacturing process unit generating the wastewater over a designated 12 month period. For flexible operation units, the Permittee shall consider the anticipated production over the designated 12 month period and include all wastewater streams generated by the process equipment during this period. The Permittee is not required to determine the concentration of Table 8 or Table 9 compounds that are not reasonably expected to be in the process [Tables found in 40 CFR Part 63, Subpart G].

(1) Existing sources. A Permittee of an existing source who elects to comply with the requirements of 40 CFR 63.144(a)(1) shall determine the flow weighted total annual average concentration for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G]. For the purposes of 40 CFR 63.144, the term concentration, whether concentration is used alone or with other terms, may be adjusted by multiplying by the compound-specific fraction measured (Fm) factors listed in Table 34 of 40 CFR Part 63, Subpart G unless determined by the methods in 40 CFR 63.144(b)(5)(i)(A) and/or 63.144(b)(5)(i)(B). When concentration is determined by Method 305 as specified in 40 CFR 63.144(b)(5)(i)(B), concentration may be adjusted by dividing by the compound-specific Fm factors listed in Table 34 of 40 CFR Part 63, Subpart G. When concentration is determined by Method 25D as specified in 40 CFR 63.144(b)(5)(i)(A), concentration may not be adjusted by the compound-specific Fm factors listed in Table 34 of 40 CFR Part 63, Subpart G. Compound-specific Fm factors may be used only when concentrations of individual compounds are determined or when only one compound is in the wastewater stream. Flow weighted total annual average concentration for Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] means the total mass of Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] occurring in the wastewater stream during the designated 12-month period divided by the total mass of the wastewater stream during the same designated 12-month period. The total annual average concentration shall be determined for each wastewater stream either at the point of determination, or downstream of the point of determination with adjustment for concentration changes made according to 40 CFR 63.144(b)(6). The procedures specified in 40 CFR 63.144(b)(3), 63.144(b)(4), and 63.144(b)(5) are considered acceptable procedures for determining the annual average concentration. They may be used in combination, and no one procedure shall take precedence over another.

(2) [Reserved]

(3) Knowledge of the wastewater. Where knowledge is used to determine the annual average concentration, the Permittee shall provide sufficient information to document the annual average concentration for wastewater streams determined to be Group 2 wastewater streams. Documentation to determine the annual average concentration is not required for Group 1 streams. Examples of acceptable documentation include material balances, records of chemical purchases, process stoichiometry, or previous test results. If test data are used, the Permittee shall provide documentation describing the testing protocol and the means by which any losses of volatile compounds during sampling, and the bias and accuracy of the analytical method, were accounted for in the determination.

(4) Bench-scale or pilot-scale test data. Where bench-scale or pilot-scale test data are used to determine the annual average concentration, the Permittee shall provide sufficient information to document that the data are representative of the actual annual average concentration, or are reliably indicative of another relevant

characteristic of the wastewater stream that could be used to predict the annual average concentration. For concentration data, the Permittee shall also provide documentation describing the testing protocol, and the means by which any losses of volatile compounds during sampling, and the bias and accuracy of the analytical method, were accounted for in the determination of annual average concentration.

(5) Test data from sampling at the point of determination or at a location downstream of the point of determination. Where a Permittee elects to comply with 40 CFR 63.144(a)(1) by measuring the concentration for the relevant Table 8 or Table 9 compounds [Tables found in 40 CFR Part 63, Subpart G], the Permittee shall comply with the requirements of 40 CFR 63.144(b)(5). For each wastewater stream, measurements shall be made either at the point of determination, or downstream of the point of determination with adjustment for concentration changes made according to 40 CFR 63.144(b)(6). A minimum of three samples from each wastewater stream shall be taken. Samples may be grab samples or composite samples.

(i) Methods. The Permittee shall use any of the methods specified in 40 CFR 63.144(b)(5)(i)(A) through 63.144(b)(5)(i)(F).

(A) Method 25D. Use procedures specified in Method 25D of 40 CFR Part 60, Appendix A.

(B) Method 305. Use procedures specified in Method 305 of 40 CFR Part 63, Appendix A.

(C) Methods 624 and 625. Use procedures specified in Methods 624 and 625 of 40 CFR Part 136, Appendix A and comply with the sampling protocol requirements specified in 40 CFR 63.144(b)(5)(ii). If these methods are used to analyze one or more compounds that are not on the method's published list of approved compounds, the Alternative Test Procedure specified in 40 CFR 136.4 and 136.5 shall be followed. For Method 625, make corrections to the compounds for which the analysis is being conducted based on the accuracy as recovery factors in Table 7 of the Method.

(D) Method 1624 and Method 1625. Use procedures specified in Method 1624 and Method 1625 of 40 CFR Part 136, Appendix A and comply with the requirements specified in 40 CFR 63.144(b)(5)(ii). If these methods are used to analyze one or more compounds that are not on the method's published list of approved compounds, the Alternative Test Procedure specified in 40 CFR 136.4 and 136.5 shall be followed.

(E) Other EPA method(s). Use procedures specified in the method and comply with the requirements specified in 40 CFR 63.144(b)(5)(ii) and either 63.144(b)(5)(iii)(A) or 63.144(b)(5)(iii)(B).

(F) Method(s) other than EPA method. Use procedures specified in the method and comply with the requirements specified in 40 CFR 63.144(b)(5)(ii) and 63.144(b)(5)(iii)(A).

(ii) Sampling plan. The Permittee who is expressly referred to 40 CFR 63.144(b)(5)(ii) by provisions of 40 CFR Part 63, Subpart G shall prepare a sampling plan. Wastewater samples shall be collected using sampling

procedures which minimize loss of organic compounds during sample collection and analysis and maintain sample integrity. The sample plan shall include procedures for determining recovery efficiency of the relevant hazardous air pollutants listed in Table 8 or Table 9 [Tables found in 40 CFR Part 63, Subpart G]. An example of an acceptable sampling plan would be one that incorporates similar sampling and sample handling requirements to those of Method 25D of 40 CFR Part 60, Appendix A. The sampling plan shall be maintained at the facility.

(iii) Validation of methods. The Permittee shall validate EPA methods other than Methods 25D, 305, 624, 625, 1624, and 1625 using the procedures specified in 40 CFR 63.144(b)(5)(iii)(A) or 63.144(b)(5)(iii)(B). The Permittee shall validate other methods as specified in 40 CFR 63.144(b)(5)(iii)(A).

(A) Validation of EPA methods and other methods. The method used to measure organic hazardous air pollutants concentrations in the wastewater shall be validated according to section 5.1 or 5.3, and the corresponding calculations in section 6.1 or 6.3, of Method 301 of Appendix A of 40 CFR Part 63. The data are acceptable if they meet the criteria specified in section 6.1.5 or 6.3.3 of Method 301 of Appendix A of 40 CFR Part 63. If correction is required under section 6.3.3 of Method 301 of Appendix A of 40 CFR Part 63, the data are acceptable if the correction factor is within the range 0.7 to 1.30. Other sections of Method 301 of Appendix A of 40 CFR Part 63 are not required. The concentrations of the individual organic hazardous air pollutants measured in the water may be corrected to their concentrations had they been measured by Method 305 of Appendix A of 40 CFR Part 63, by multiplying each concentration by the compound-specific fraction measured (Fm) factor listed in Table 34 of 40 CFR Part 63, Subpart G.

(B) Validation for EPA methods. Follow the procedures as specified in “Alternative Validation Procedure for EPA Waste Methods” 40 CFR Part 63, Appendix D.

(iv) Calculations of average concentration. The average concentration for each individually speciated Table 8 compound [Table found in 40 CFR Part 63, Subpart G] shall be calculated by adding the individual values determined for the specific compound in each sample and dividing by the number of samples. The total average concentration of Table 9 compounds [Table found in 40 CFR Part 63, Subpart G] shall be calculated by first summing the concentration of the individual compounds to obtain a total hazardous air pollutants concentration for the sample; add the sample totals and then divide by the number of samples in the run to obtain the sample average for the run. If the method used does not speciate the compounds, the sample results should be added and this total divided by the number of samples in the run to obtain the sample average for the run.

(6) Adjustment for concentrations determined downstream of the point of determination. The Permittee shall make corrections to the annual average concentration or total annual average concentration when the concentration is determined downstream of the point of determination at a location where: two or more wastewater streams have been mixed; one or more wastewater streams have been treated; or, losses to the atmosphere have occurred. The Permittee

shall make the adjustments either to the individual data points or to the final annual average concentration.

(c) Pursuant to 40 CFR 63.144(c), the procedures to determine flow rate, when evaluating Group status under 40 CFR 63.144(a)(1) are specified. A Permittee who elects to comply with 40 CFR 63.144(a)(1) shall determine the annual average flow rate of the wastewater stream either at the point of determination for each wastewater stream, or downstream of the point of determination with adjustment for flow rate changes made according to 40 CFR 63.144(c)(4). These procedures may be used in combination for different wastewater streams at the source. The annual average flow rate for the wastewater stream shall be representative of actual or anticipated operation of the chemical manufacturing process unit generating the wastewater over a designated 12-month period. The Permittee shall consider the total annual wastewater volume generated by the chemical manufacturing process unit. If the chemical manufacturing process unit is a flexible operation unit, the Permittee shall consider all anticipated production in the process equipment over the designated 12-month period. The procedures specified in 40 CFR 63.144(c)(1), 63.144(c)(2), and 63.144(c)(3) are considered acceptable procedures for determining the flow rate. They may be used in combination, and no one procedure shall take precedence over another.

(1) Knowledge of the wastewater. The Pemittee may use knowledge of the wastewater stream and/or the process to determine the annual average flow rate. The Permittee shall use the maximum expected annual average production capacity of the process unit, knowledge of the process, and/or mass balance information to either: Estimate directly the annual average wastewater flow rate; or estimate the total annual wastewater volume and then divide total volume by 525,600 minutes in a year. Where knowledge is used to determine the annual average flow rate, the Permittee shall provide sufficient information to document the flow rate for wastewater streams determined to be Group 2 wastewater streams. Documentation to determine the annual average flow rate is not required for Group 1 streams.

(2) Historical Records. The Permittee may use historical records to determine the annual average flow rate. Derive the highest annual average flow rate of wastewater from historical records representing the most recent 5 years of operation or, if the process unit has been in service for less than 5 years but at least 1 year, from historical records representing the total operating life of the process unit. Where historical records are used to determine the annual average flow rate, the Permittee shall provide sufficient information to document the flow rate for wastewater streams determined to be Group 2 wastewater streams. Documentation to determine the annual average flow rate is not required for Group 1 streams.

(3) Measurements of flow rate. Where a Permittee elects to comply with 40 CFR 63.144(a)(1) by measuring the flow rate, the Permittee shall comply with the requirements of 40 CFR 63.144(c)(3). Measurements shall be made at the point of determination, or at a location downstream of the point of determination with adjustments for flow rate changes made according to 40 CFR 63.144(c)(4). Where measurement data are used to determine the annual average flow rate, the Permittee shall provide sufficient information to document the flow rate for wastewater streams determined to be Group 2 wastewater streams. Documentation to determine the annual average flow rate is not required for Group 1 streams.

(4) Adjustment for flow rates determined downstream of the point of determination. The Permittee shall make corrections to the annual average flow rate of a wastewater stream when it is determined downstream of the point of determination at a location where two or more wastewater streams have been

mixed or one or more wastewater streams have been treated. The Permittee shall make corrections for such changes in the annual average flow rate.

BB.9 Procedures for Calculating Debits and Credits For Emissions Averaging [326 IAC 20-11] [40 CFR 63.150, Subpart G]

(a) [Applicable under BB.5]

(b) [Reserved]

(c) [Applicable under BB.5]

(d) [Reserved]

(e) [Applicable under BB.5]

(f) Pursuant to 40 CFR 63.150(f), debits and credits shall be calculated in accordance with the methods and procedures specified in 40 CFR 63.150(g) and 63.150(h), respectively, and shall not include emissions from the following:

(1) [Reserved]

(2) Periods of start-up, shutdown, and malfunction as described in the source's start-up, shutdown, and malfunction plan required by 40 CFR 63.6(e)(3) of Subpart A.

(3) Periods of monitoring excursions as defined in 40 CFR 63.152(c)(2)(ii)(A). For these periods, the calculation of monthly credits and debits shall be adjusted as specified in 40 CFR 63.150(f)(3)(i) through 63.150 (f)(3)(iii).

(i) No credits would be assigned to the credit-generating emission point.

(ii) Maximum debits would be assigned to the debit-generating emission point.

(iii) [Reserved]

(g) Pursuant to 40 CFR 63.150(g), debits are generated by the difference between the actual emissions from a Group 1 emission point that is uncontrolled or is controlled to a level less stringent than the reference control technology, and the emissions allowed for the Group 1 emission point. Debits shall be calculated as follows:

(1) The overall equation for calculating source-wide debits is:

$$\text{Debits} = \sum_{i=1}^{n} \left(\text{EWWiACTUAL} - \text{EWWic} \right)$$

Where:

Debits and all terms of the equation are in units of megagrams per month, and

EWWiACTUAL = Emissions from each Group 1 wastewater stream i that is uncontrolled or is controlled to a level less stringent than the reference control technology. This is calculated according to 40 CFR 63.150(g)(5).

EWWic = Emissions from each Group 1 wastewater stream i if the reference control technology had been applied to the uncontrolled emissions. This is calculated according to 40 CFR 63.150(g)(5).

n = The number of emission points being included in the emissions average. The value of n is not necessarily the same for process vents, storage vessels, transfer racks, and wastewater.

(2) Emissions from process vents shall be calculated according to 40 CFR 63.150(g)(2)(i) through 63.150(g)(2)(iii).

(i) The location of a process vent shall be defined, and the characteristics of its gas stream shall be determined at a point that meets the conditions in either 40 CFR 63.150(g)(2)(i)(A) or 63.150(g)(2)(i)(B) and the conditions in paragraphs 63.150(g)(2)(i)(C) through 63.150(g)(2)(i)(E).

(A) The point is after the final recovery device (if any recovery devices are present).

(B) If a gas stream included in an emissions average is combined with one or more other gas streams after a final recovery device (if any recovery devices are present), then for each gas stream, the point is at a representative point after any final recovery device and as near as feasible to, but before, the point of combination of the gas streams.

(C) The point is before any control device (for process vents, recovery devices shall not be considered control devices).

(D) The point is before discharge to the atmosphere.

(E) The measurement site for determination of the characteristics of the gas stream was selected using Method 1 or 1A of 40 CFR Part 60, Appendix A.

(ii) The following equation shall be used for each process vent i to calculate EPViu:

$$EPV_{iu} = (2.494 \times 10^{-9})\, Qh \left(\sum_{j=1}^{n} C_j M_j \right)$$

where:

EPViu = Uncontrolled process vent emission rate from process vent i, megagrams per month.

Q = Vent stream flow rate, dry standard cubic meters per minute, measured using Method 2, 2A, 2C, or 2D of 40 CFR Part 60, Appendix A, as appropriate.

h = Monthly hours of operation during which positive flow is present in the vent, hours per month.

Cj = Concentration, parts per million by volume, dry basis, of organic HAP j as measured by Method 18 of 40 CFR Part 60, Appendix A.

Mj = Molecular weight of organic HAP j, gram per gram-mole.

n = Number of organic HAP's.

(A) The values of Q, Cj, and Mj shall be determined during a performance test conducted under representative operating conditions. The values of Q, Cj, and Mj shall be established in the Notification of Compliance Status and must be updated as provided in 40 CFR 63.150(g)(2)(ii)(B).

(B) If there is a change in capacity utilization other than a change in monthly operating hours, or if any other change is made to the process or product recovery equipment or operation such that the previously measured values of Q, Cj, and Mj are no longer representative, a new performance test shall be conducted to determine new representative values of Q, Cj, and Mj. These new values shall be used to calculate debits and credits from the time of the change forward, and the new values shall be reported in the next Periodic Report.

(iii) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) Emissions from wastewater shall be calculated as follows:

(i) The following equation shall be used for each wastewater stream i to calculate EWWic:

$$EWW_{ic} = \left(6.0 * 10^{-8}\right) Q_i H_i \sum_{m=1}^{s} \left(1 - Fr_m\right) Fe_m HAP_{im}$$
$$+ (0.05)\left(6.0 * 10^{-8}\right) Q_i H_i \sum_{m=1}^{s} \left(Fr_m HAP_m\right)$$

where:

EWWic = Monthly wastewater stream emission rate if wastewater stream i is controlled by the reference control technology, megagrams per month.

Qi = Average flow rate for wastewater stream i, as determined by the procedure in 40 CFR 63.144(c)(3), liters per minute.

Hi = Number of hours during the month that wastewater stream i was generated, hours per month.

s = Total number of Table 9 HAP in wastewater stream i [Table found in 40 CFR Part 63, Subpart G].

Frm = Fraction removed of Table 9 HAP m in wastewater, from Table 9, dimensionless [Table found in 40 CFR Part 63, Subpart G].

Fem = Fraction emitted of Table 9 HAP m in wastewater, from Table 34, dimensionless [Tables found in 40 CFR Part 63, Subpart G].

HAPim = Average concentration of Table 9 HAP m in wastewater stream i, parts per million by weight [Table found in 40 CFR Part 63, Subpart G].

(A) HAPim shall be determined for the point of determination or, at a location downstream of the point of determination and adjusted according as specified in 40 CFR 63.144(b)(6), by developing and using the sampling plan specified in 63.144(b)(5)(ii). The samples collected may be analyzed by any of the methods specified in 40 CFR 63.144(b)(5)(i)(B) through 63.144(b)(5)(i)(F). Concentration measurements based on Method 305 shall be adjusted by dividing each concentration by the compound-specific Fm factor listed on Table 34 of 40 CFR Part 63, Subpart G. Concentration measurements other than Method 305 shall not be adjusted by the compound-specific Fm factor listed in Table 34 of 40 CFR Part 63, Subpart G.

(B) [Reserved]

(C) If there is a change to the process or operation such that the previously measured values of Qi, HAPim, and Cim are no longer representative, a new performance test shall be conducted to determine new representative values of Qi, HAPim, and Cim. These new values shall be used to calculate debits and credits from the time of the change forward, and the new values shall be reported in the next Periodic Report.

(ii) The following equation shall be used to calculate EWWiACTUAL for each wastewater stream i that is not managed according to the provisions for waste management units of 40 CFR 63.133 through 63.137, as applicable, which specify equipment and work practices for suppressing and controlling vapors. Qi, Hi, s, Fem, and HAPim are as defined and determined according to 40 CFR 63.150(g)(5)(i).

$$EWW_{iactual} = \left(6.0 \times 10^{-8}\right) Q_i H_i \sum_{m=1}^{s} Fe_m HAP_{im}$$

where:

EWWiACTUAL = Monthly wastewater stream emission rate if wastewater stream i is uncontrolled or is controlled to a level less stringent than the reference control technology, megagrams per month.

(iii) [Reserved]

(h) Pursuant to 40 CFR 63.150(h), credits are generated by the difference between emissions that are allowed for each Group 1 and Group 2 emission point and the actual emissions from a Group 1 or Group 2 emission point that has been controlled after November 15, 1990 to a level more stringent than what is required by 40 CFR Part 63, Subpart G or any other State or Federal rule or statute. Credits shall be calculated as follows:

(1) The overall equation for calculating source-wide credits is:

$$\text{Credits} = D \sum_{i=1}^{m} \left(EPV2_{iBase} - EPV2_{iActual} \right)$$

where:

Credits and all terms of the equation are in units of megagrams per month, the baseline date is November 15, 1990, and:

D = Discount factor = 0.9 for all credit generating emission points.

EPV2iACTUAL = Emissions from each Group 2 process vent i that is controlled, calculated according to 40 CFR 63.150(h)(2).

EPV2iBASE = Emissions from each Group 2 process vent i at the baseline date, as calculated in 40 CFR 63.150(h)(2).

m = Number of Group 2 emission points included in the emissions average. The value of m is not necessarily the same for process vents, storage vessels, transfer racks, and wastewater.

(i) For an emission point controlled using a reference control technology, the percent reduction for calculating credits shall be no greater than the nominal efficiency associated with the reference control technology, unless a higher nominal efficiency is assigned as specified in 40 CFR 63.150(h)(1)(ii).

(ii) [Reserved]

(iii) [Reserved]

(2) Emissions from process vents shall be determined as follows:

(i) [Reserved]

(ii) [Reserved]

(iii) The following procedures shall be used to calculate actual emissions, EPV2iACTUAL:

(A) For a Group 2 process vent controlled by a control device, a recovery device applied as a pollution prevention project, or a pollution prevention measure, if the control achieves a percent reduction less than or equal to 98 percent reduction,

$$EPV2_{iACTUAL} = EPV2_{iu} \times \left(1 - \frac{Percent\ \text{reduction}}{100\%}\right)$$

(1) EPV2iu shall be calculated according to the equations and procedures for EPViu in 40 CFR 63.150(g)(2)(i) and 63.150(g)(2)(ii).

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(B) [Reserved]

(iv) Emissions from Group 2 process vents at baseline, EPV2iBASE, shall be calculated as follows:

(A) If the process vent was uncontrolled on November 15, 1990, EPV2iBASE = EPV2iu and shall be calculated according to the procedures and equation for EPViu in 40 CFR 63.150(g)(2)(i) and 63.150(g)(2)(ii).

(B) [Reserved]

(C) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(i) [Reserved]

(j) [Reserved]

(k) [Applicable under BB.5]

(l) [Reserved]

(m) [Applicable under BB.5]

(n) [Applicable under BB.15]

(o) [Applicable under BB.15]

Recordkeeping and Reporting Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-19]

BB.10 Process Vent Provisions - Methods and Procedures for Process Vent Group Determination. [326 IAC 20-11] [40 CFR 63.115, Subpart G]

(a) [Applicable under BB.6]

(b) [Applicable under BB.6]

(c) [Reserved]

(d) [Applicable under BB.6]

(e) Pursuant to 40 CFR 63.115(e), the Permittee of a Group 2 process vent shall recalculate the TRE index value, flow, or organic hazardous air pollutants concentration for each process vent, as necessary to determine whether the vent is Group 1 or Group 2, whenever process changes are made that could reasonably be expected to change the vent to a Group 1 vent. Examples of process changes include, but are not limited to, changes in production capacity, production rate, feedstock type, or catalyst type, or whenever there is replacement, removal, or addition of recovery equipment. For purposes of 40 CFR 63.115(e), process changes do not include: Process upsets; unintentional, temporary process changes; and changes that are within the range on which the original TRE calculation was based.

(1) [Applicable under BB.6]

(2) Where the recalculated TRE index value is less than or equal to 1.0, or less than or equal to 4.0 but greater than 1.0, the recalculated flow rate is greater than or equal to 0.005 standard cubic meter per minute, or the recalculated concentration is greater than or equal to 50 parts per million by volume, the

Permittee shall submit a report as specified in 40 CFR 63.118(g), 63.118(h), 63.118(i), or 63.118(j) and shall comply with the appropriate provisions in 40 CFR 63.113 and by the dates specified in 40 CFR 63.100 of Subpart F.

(f) [Reserved]

BB.11 Process Vent Provisions, Requirements for Group and TRE Determinations and Performance tests. [326 IAC 12] [40 CFR 63.117, Subpart G]

(a) Pursuant to 40 CFR 63.117(a), each Permittee subject to the control provisions for Group 1 process vents in 40 CFR 63.113(a) or the provisions for Group 2 process vents with a TRE index value greater than 1.0 but less than or equal to 4.0 in 40 CFR 63.113(d) shall:

(1) Keep an up-to-date, readily accessible record of the data specified in 40 CFR 63.117(a)(4) through 63.117(a)(8), as applicable, and

(2) Include the data specified in 40 CFR 63.117(a)(4) through 63.117(a)(8) in the Notification of Compliance Status report as specified in 40 CFR 63.152(b).

(3) If any subsequent TRE determinations or performance tests are conducted after the Notification of Compliance Status has been submitted, report the data in 40 CFR 63.117(a)(4) through 63.117(a)(8) in the next Periodic Report as specified in 40 CFR 63.152(c).

(4) Record and report the following when using a combustion device to achieve a 98 weight percent reduction in organic HAP or an organic HAP concentration of 20 parts per million by volume, as specified in 40 CFR 63.113(a)(2):

(i) The parameter monitoring results for incinerators, catalytic incinerators, boilers or process heaters specified in Table 3 of 40 CFR Part 63, Subpart G, and averaged over the same time period of the performance testing.

(ii) For an incinerator, the percent reduction of organic HAP or TOC achieved by the incinerator determined as specified in 40 CFR 63.116(c), or the concentration of organic HAP or TOC (parts per million by volume, by compound) determined as specified in 40 CFR 63.116(c) at the outlet of the incinerator on a dry basis corrected to 3 percent oxygen.

(iii) For a boiler or process heater, a description of the location at which the vent stream is introduced into the boiler or process heater.

(iv) [Reserved]

(5) [Reserved]

(6) [Reserved]

(7) Record and report the following when achieving and maintaining a TRE index value greater than 1.0 but less than 4.0 as specified in 40 CFR 63.113(a)(3) or 63.113(d):

(i) The parameter monitoring results for absorbers, condensers, or carbon adsorbers, as specified in Table 4 of 40 CFR Part 63, Subpart G, and averaged over the same time period of the measurements of vent stream flow rate and concentration used in the TRE determination (both measured while the vent stream is normally routed and constituted), and

(ii) The measurements and calculations performed to determine the TRE index value of the vent stream.

(8) [Reserved]

(b) Pursuant to 40 CFR 63.117(b), the Permittee of a Group 2 process vent with a TRE index greater than 4.0 as specified in 40 CFR 63.113(e), shall maintain records and submit as part of the Notification of Compliance Status specified in 40 CFR 63.152, measurements, engineering assessments, and calculations performed to determine the TRE index value of the vent stream. Documentation of engineering assessments shall include all data, assumptions, and procedures used for the engineering assessments, as specified in 40 CFR 63.115(d)(1).

(c) Pursuant to 40 CFR 63.117(c), the Permittee who elects to demonstrate that a process vent is a Group 2 process vent based on a flow rate less than 0.005 standard cubic meter per minute must submit to IDEM, OAQ the flow rate measurement using methods and procedures specified in 40 CFR 63.115(a) and 63.115(b) with the Notification of Compliance Status specified in 40 CFR 63.152.

(d) [Reserved]

(e) [Reserved]

(f) Pursuant to 40 CFR 63.117(f), for each parameter monitored according to Tables 3 or 4 of 40 CFR Part 63, Subpart G, the Permittee shall establish a range for the parameter that indicates proper operation of the control or recovery device. In order to establish the range, the information required in 40 CFR 63.152(b) shall be submitted in the Notification of Compliance Status or the operating permit application or amendment.

BB.12 Process Vent Provisions - Periodic Reporting and Recordkeeping Requirements. [326 IAC 12] [40 CFR 63.118, Subpart G]

(a) Pursuant to 40 CFR 63.118(a), each Permittee using a control device to comply with 40 63.113(a)(2) shall keep the following records up-to-date and readily accessible:

(1) Continuous records of the equipment operating parameters specified to be monitored under 40 CFR 63.114(a) and listed in Table 3 of 40 CFR Part 63, Subpart G.

(2) Records of the daily average value of each continuously monitored parameter for each operating day determined according to the procedures specified in 40 CFR 63.152(f).

(3) Hourly records of whether the flow indicator specified under 40 CFR 63.114(d)(1) was operating and whether a diversion was detected at any time during the hour, as well as records of the times and durations of all periods when the gas stream is diverted to the atmosphere or the monitor is not operating.

(4) Where a seal mechanism is used to comply with 40 CFR 63.114(d)(2), hourly records of flow are not required. In such cases, the Permittee shall record that the monthly visual inspection of the seals or closure mechanism has been done, and shall record the duration of all periods when the seal mechanism is broken, the bypass line valve position has changed, or the key for a lock-and-key type lock has been checked out, and records of any car-seal that has broken.

(b) Pursuant to 40 CFR 63.118(b), each Permittee using a recovery device or other means to achieve and maintain a TRE index value greater than 1.0 but less than 4.0 as specified in 40 CFR 63.113(d) shall keep the following records up-to-date and readily accessible:

(1) Continuous records of the equipment operating parameters specified to be monitored under 40 CFR 63.114(b) and listed in Table 4 of 40 CFR Part 63, Subpart G and

(2) Records of the daily average value of each continuously monitored parameter for each operating day determined according to the procedures specified in 40 CFR 63.152(f). If carbon adsorber regeneration stream flow and carbon bed regeneration temperature are monitored, the records specified in Table 4 of 40 CFR Part 63, Subpart G shall be kept instead of the daily averages.

(c) Pursuant to 40 CFR 63.118(c), each Permittee subject to the provisions of Subpart G and who elects to demonstrate compliance with the TRE index value greater than 1.0 under 40 CFR 63.113(d) shall keep up-to-date, readily accessible records of:

(1) Any process changes as defined in 40 CFR 63.115(e); and

(2) Any recalculation of the TRE index value pursuant to 40 CFR 63.115(e).

(d) Pursuant to 40 CFR 63.118(d), each Permittee who elects to comply by maintaining a flow rate less than 0.005 standard cubic meter per minute under 40 CFR 63.113(f), shall keep up-to-date, readily accessible records of:

(1) Any process changes as defined in 40 CFR 63.115(e) that increase the vent stream flow rate,

(2) Any recalculation or measurement of the flow rate pursuant to 40 CFR 63.115(e), and

(3) If the flow rate increases to 0.005 standard cubic meter per minute or greater as a result of the process change, the TRE determination performed according to the procedures of 40 CFR 63.115(d).

(e) [Reserved]

(f) Pursuant to 40 CFR 63.118(f), each Permittee who elects to comply with the requirements of 40 CFR 63.113 shall submit to IDEM, OAQ Periodic Reports of the following recorded information according to the schedule in 40 CFR 63.152.

(1) Reports of daily average values of monitored parameters for all operating days when the daily average values recorded under 40 CFR 63.118(a) and 63.118(b) were outside the ranges established in the Notification of Compliance Status or operating permit.

(2) For Group 1 points, reports of the duration of periods when monitoring data is not collected for each excursion caused by insufficient monitoring data as defined in 40 CFR 63.152(c)(2)(ii)(A).

(3) Reports of the times and durations of all periods recorded under 40 CFR 63.118(a)(3) when the gas stream is diverted to the atmosphere through a bypass line.

(4) Reports of all periods recorded under 40 CFR 63.118(a)(4) in which the seal mechanism is broken, the bypass line valve position has changed, or the key to unlock the bypass line valve was checked out.

(5) [Reserved]

(6) Reports of all carbon bed regeneration cycles during which the parameters recorded under 40 CFR 63.118(b)(2)(v) were outside the ranges established in the Notification of Compliance Status or operating permit.

(g) Pursuant to 40 CFR 63.118(g), whenever a process change, as defined in 40 CFR 63.115(e), is made that causes a Group 2 process vent to become a Group 1 process vent, the Permittee shall submit a report within 180 calendar days after the process change as specified in 40 CFR 63.151(j). The report shall include:

(1) A description of the process change;

(2) The results of the recalculation of the flow rate, organic HAP concentration, and TRE index value required under 40 CFR 63.115(e) and recorded under 40 CFR 63.118(c) or 63.118(d); and

(3) A statement that the Permittee will comply with the provisions of 40 CFR 63.113 for Group 1 process vents by the dates specified in 40 CFR Part 63, Subpart F.

(h) Pursuant to 40 CFR 63.118(h), whenever a process change, as defined in 40 CFR 63.115(e), is made that causes a Group 2 process vent with a TRE greater than 4.0 to become a Group 2 process vent with a TRE less than 4.0, the Permittee shall submit a report within 180 calendar days after the process change. The report may be submitted as part of the next periodic report. The report shall include:

(1) A description of the process change,

(2) The results of the recalculation of the TRE index value required under 40 CFR 63.115(e) and recorded under 40 CFR 63.118(c), and

(3) A statement that the Permittee will comply with the requirements specified in 40 CFR 63.113(d).

(i) Pursuant to 40 CFR 63.118(i), whenever a process change, as defined in 40 CFR 63.115(e), is made that causes a Group 2 process vent with a flow rate less than 0.005 standard cubic meter per minute to become a Group 2 process vent with a flow rate of 0.005 standard cubic meter per minute or greater and a TRE index value less than or equal to 4.0, the Permittee shall submit a report within 180 calendar days after the process change. The report may be submitted as part of the next periodic report. The report shall include:

(1) A description of the process change,

(2) The results of the recalculation of the flow rate and the TRE determination required under 40 CFR 63.115(e) and recorded under 40 CFR 63.118(d), and

(3) A statement that the Permittee will comply with the requirements specified in 40 CFR 63.113(d).

(j) Pursuant to 40 CFR 63.118(j), whenever a process change, as defined in 40 CFR 63.115(e), is made that causes a Group 2 process vent with an organic HAP concentration less than 50 parts per million by volume to become a Group 2 process vent with an organic HAP concentration of 50 parts per million by volume or greater and a TRE index value less than or equal to 4.0, the Permittee shall submit a report within 180 calendar days after the process change. The report may be submitted as part of the next periodic report. The report shall include:

(1) A description of the process change,

(2) The results of the recalculation of the organic HAP concentration and the TRE determination required under 40 CFR 63.115(e) and recorded under 40 CFR 63.118(e), and

(3) A statement that the Permittee will comply with the requirements specified in 40 CFR 63.113(d).

(k) Pursuant to 40 CFR 63.118(k), the Permittee is not required to submit a report of a process change if one of the conditions listed in 40 CFR 63.118(k)(1), 63.118(k)(2), 63.118(k)(3), or 63.118(k)(4) is met.

(1) The process change does not meet the definition of a process change in 40 CFR 63.115(e), or

(2) The vent stream flow rate is recalculated according to 40 CFR 63.115(e) and the recalculated value is less than 0.005 standard cubic meter per minute, or

(3) The organic HAP concentration of the vent stream is recalculated according to 40 CFR 63.115(e) and the recalculated value is less than 50 parts per million by volume, or

(4) The TRE index value is recalculated according to 40 CFR 63.115(e) and the recalculated value is greater than 4.0.

BB.13 Process Wastewater Provisions - Reporting. [326 IAC 12] [40 CFR 63.146, Subpart G]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.146(b), the Permittee shall submit the information specified in 40 CFR 63.146(b)(1) through 63.146(b)(2) as part of the Notification of Compliance Status required by 40 CFR 63.152(b).

(1) Requirements for Group 2 wastewater streams. For Group 2 wastewater streams, the Permittee shall include the information specified in 40 CFR 63.146(b)(1)(i) through 63.146(b)(1)(iv) in the Notification of Compliance Status Report. This information may be submitted in any form. Table 15 of 40 CFR Part 63, Subpart G is an example.

(i) Process unit identification and description of the process unit.

(ii) Stream identification code.

(iii) For existing sources, concentration of Table 9 compound(s) [Table found in 40 CFR Part 63, Subpart G] in parts per million, by weight. For new sources, concentration of Table 8 and/or Table 9 [both Tables found in 40 CFR Part 63, Subpart G] compound(s) in parts per million, by weight. Include documentation of the methodology used to determine concentration.

(iv) Flow rate in liter per minute.

(2) For each new and existing source, the Permittee shall submit the information specified in Table 15 for Table 8 and/or Table 9 compounds [all Tables found in 40 CFR Part 63, Subpart G].

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(6) [Reserved]

(7) [Reserved]

(8) [Reserved]

(9) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

B.14 Process Wastewater Provisions - Recordkeeping. [326 IAC 12] [40 CFR 63.147, Subpart G]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.147(b), the Permittee shall keep in a readily accessible location the records specified in 40 CFR 63.147(b)(1) through 63.147(8).

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(6) [Reserved]

(7) [Reserved]

(8) Requirements for Group 2 wastewater streams. The Permittee shall keep in a readily accessible location the records specified in 40 CFR 63.147(b)(8)(i) through 63.147(b)(8)(iv) for all other Group 2 wastewater streams.

(i) Process unit identification and description of the process unit.

(ii) Stream identification code.

(iii) For existing sources, concentration of Table 9 compound(s) [Table found in 40 CFR Part 63, Subpart G] in parts per million, by weight. For new sources, concentration of Table 8 and/or Table 9 compound(s) [both Tables found in 40 CFR Part 63, Subpart G] in parts per million, by weight. Include documentation of the methodology used to determine concentration.

(iv) Flow rate in liter per minute.

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) Pursuant to 40 CFR 63.147(f), if the Permittee uses process knowledge to determine the annual average concentration of a wastewater stream as specified in 40 CFR 63.144(b)(3) and/or uses process knowledge to determine the annual average flow rate as specified in 40 CFR 63.144(c)(1), and determines that the wastewater stream is not a Group 1 wastewater stream, the Permittee shall keep in a readily accessible location the documentation of how process knowledge was used to determine the annual average concentration and/or the annual average flow rate of the wastewater stream.

BB.15 Emissions Averaging Provisions. [326 IAC 20-11] [40 CFR 63.150, Subpart G]

(a) [Applicable under BB.5]

(b) [Reserved]

(c) [Applicable under BB.5]

(d) [Reserved]

(e) Pursuant to 40 CFR 63.150(e), for all points included in an emissions average, the Permittee shall:

(1) Calculate and record monthly debits for all Group 1 emission points that are controlled to a level less stringent than the reference control technology for those emission points. Equations in 40 CFR 63.150(g) shall be used to calculate debits.

(2) Calculate and record monthly credits for all Group 1 or Group 2 emission points that are over controlled to compensate for the debits. Equations in 40 CFR 63.150(h) shall be used to calculate credits. Emission points and controls that meet the criteria of 40 CFR 63.150(c) may be included in the credit calculation, whereas those described 40 CFR 63.150(d) shall not be included.

(3) Demonstrate that annual credits calculated according to 40 CFR 63.150(h) are greater than or equal to debits calculated for the same annual compliance period according to 40 CFR 63.150(g).

(i) The Permittee may choose to include more than the required number of credit-generating emission points in an average in order to increase the likelihood of being in compliance.

(ii) The initial demonstration in the Implementation Plan or operating permit application that credit-generating emission points will be capable of generating sufficient credits to offset the debits from the debit-generating emission points must be made under representative operating conditions. After the compliance date, actual operating data will be used for all debit and credit calculations.

(4) Demonstrate that debits calculated for a quarterly (3-month) period according to 40 CFR 63.150(g) are not more than 1.30 times the credits for the same period calculated according to 40 CFR 63.150(h). Compliance for the quarter shall be determined based on the ratio of credits and debits from that quarter, with 30 percent more debits than credits allowed on a quarterly basis.

(5) Record and report quarterly and annual credits and debits in the Periodic Reports as specified in 40 CFR 63.152(c). Every fourth Periodic Report shall include a

certification of compliance with the emissions averaging provisions as required by 40 CFR 63.152(c)(5)(iv)(B).

(f) [Applicable under BB.9]

(g) [Applicable under BB.9]

(h) [Applicable under BB.9]

(i) [Reserved]

(j) [Reserved]

(k) [Applicable under BB.5]

(l) [Reserved]

(m) [Applicable under BB.5]

(n) Pursuant to 40 CFR 63.150(n), records of all information required to calculate emission debits and credits shall be retained for five years.

(o) Pursuant to 40 CFR 63.150(o), Initial Notifications, Implementation Plans, Notifications of Compliance Status, Periodic Reports, and other reports shall be submitted as required by 40 CFR 63.151 and 63.152.

BB.16 General Reporting and Continuous Records. [326 IAC 12] [40 CFR 63.151, Subpart G]

(a) Pursuant to 40 CFR 63.151(a), the Permittee of a source subject to 40 CFR Part 63, Subpart G shall submit the reports listed in 40 CFR 63.152(a)(1) through 63.152(a)(5).

(1) [Reserved]

(2) [Reserved]

(3) A Notification of Compliance Status described in 40 CFR 63.152(b).

(4) Periodic Reports described in 40 CFR 63.152(c).

(5) Other reports described in 40 CFR 63.152(d) and 63.152(e).

(6) [Reserved]

(7) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) Pursuant to 40 CFR 63.151(f), the Permittee who has been directed by any section of 40 CFR 63, Subpart G that expressly references 40 CFR 63.151(f) to set unique monitoring parameters or who requests approval to monitor a different parameter than those listed in 40 CFR 63.114 for process vents, 40 CFR 63.127 for transfer, or 40 CFR 63.143 for process wastewater of this subpart shall submit the information specified in 40 CFR

63.151(f)(1), (f)(2), and (f)(3) with the operating permit application or as otherwise specified by the permitting authority.

(1) A description of the parameter(s) to be monitored to ensure the control technology or pollution prevention measure is operated in conformance with its design and achieves the specified emission limit, percent reduction, or nominal efficiency, and an explanation of the criteria used to select the parameter(s).

(2) A description of the methods and procedures that will be used to demonstrate that the parameter indicates proper operation of the control device, the schedule for this demonstration, and a statement that the owner or operator will establish a range for the monitored parameter as part of the Notification of Compliance Status report required in 40 CFR 63.152(b), unless this information has already been included in the operating permit application.

(3) The frequency and content of monitoring, recording, and reporting if monitoring and recording is not continuous, or if reports of daily average values when the monitored parameter value is outside the range established in the operating permit or Notification of Compliance Status will not be included in Periodic Reports required under 40 CFR 63.152(c). The rationale for the proposed monitoring, recording, and reporting system shall be included.

(g) Pursuant to 40 CFR 63.151(g), the Permittee may request approval to use alternatives to the continuous operating parameter monitoring and recordkeeping provisions listed in 40 CFR 63.114, 63.117, and 63.118 for process vents, 40 CFR 63.127, 63.129, and 63.130 for transfer operations, and 40 CFR 63.143, 63.146, and 63.147 for wastewater.

(1) Requests shall be included in the operating permit application or as otherwise specified by the permitting authority and shall contain the information specified in paragraphs 40 CFR 63.151(g)(3) through (g)(5), as applicable.

(2) The provisions in 40 CFR 63.8(f)(5)(i) of subpart A shall govern the review and approval of requests.

(3) The Permittee of a source that does not have an automated monitoring and recording system capable of measuring parameter values at least once every 15 minutes and generating continuous records may request approval to use a non-automated system with less frequent monitoring.

(i) The requested system shall include manual reading and recording of the value of the relevant operating parameter no less frequently than once per hour. Daily average values shall be calculated from these hourly values and recorded.

(ii) The request shall contain:

(A) A description of the planned monitoring and recordkeeping system;

(B) Documentation that the source does not have an automated monitoring and recording system;

(C) Justification for requesting an alternative monitoring and recordkeeping system; and

(D) Demonstration to IDEM/OAQ satisfaction that the proposed monitoring frequency is sufficient to represent control device operating conditions considering typical variability of the specific

process and control device operating parameter being monitored.

(4) The Permittee may request approval to use an automated data compression recording system that does not record monitored operating parameter values at a set frequency (for example once every 15 minutes) but records all values that meet set criteria for variation from previously recorded values.

(i) The requested system shall be designed to:

(A) Measure the operating parameter value at least once every 15 minutes.

(B) Record at least four values each hour during periods of operation.

(C) Record the date and time when monitors are turned off or on.

(D) Recognize unchanging data that may indicate the monitor is not functioning properly, alert the operator, and record the incident.

(E) Compute daily average values of the monitored operating parameter based on recorded data.

(F) If the daily average is not an excursion, as defined in 40 CFR 63.152(c)(2)(ii), the data for that operating day may be converted to hourly average values and the four or more individual records for each hour in the operating day may be discarded.

(ii) The request shall contain a description of the monitoring system and data compression recording system, including the criteria used to determine which monitored values are recorded and retained, the method for calculating daily averages, and a demonstration that the system meets all criteria in 40 CFR 63.151(g)(4)(i).

(5) The Permittee may request approval to use other alternative monitoring systems according to the procedures specified in 40 CFR 63.8(f) of subpart A.

(h) The Permittee required to prepare an Implementation Plan, or otherwise required to submit a report, under 40 CFR 63.151(c), (d), or (e) shall also submit a supplement for any additional alternative controls or operating scenarios that may be used to achieve compliance.

(i) The Permittee of a source required to submit an Implementation Plan for emissions averaging under 40 CFR 63.151(c) and (d) shall also submit written updates of the Implementation Plan to IDEM/OAQ for approval under the circumstances described in 40 CFR 63.151(i)(1) and (i)(2) unless the relevant information has been included and submitted in an operating permit application or amendment.

(1) The Permittee who plans to make a change listed in 40 CFR 63.151(i)(1)(i) or 63.151(i)(1)(ii) shall submit an Implementation Plan update at least 120 calendar days prior to making the change.

(i) Whenever the Permittee elects to achieve compliance with the emissions averaging provisions in 40 CFR 63.150 by using a control technique other than that specified in the Implementation Plan or plans to monitor a different parameter or operate a control device in a manner other than that specified in the Implementation Plan.

(ii) Whenever an emission point or a chemical manufacturing process unit is added to an existing source and is planned to be included in an emissions average, or whenever an emission point not included in the emissions average described in the Implementation Plan is to be added to an emissions average. The information in 40 CFR 63.151(d) shall be updated to include the additional emission point.

(2) The Permittee who has made a change listed in 40 CFR 63.151(i)(2)(i) or 63.151(i)(2)(ii) shall submit an Implementation Plan update within 90 calendar days after the information regarding the change is known to the source. The update may be submitted in the next quarterly Periodic Report if the change is made after the date the Notification of Compliance status is due.

(i) Whenever a process change is made such that the group status of any emission point in an emissions average changes.

(ii) Whenever a value of a parameter in the emission credit or debit equations in 40 CFR 63.150(g) or (h) changes such that it is outside the range specified in the Implementation Plan and causes a decrease in the projected credits or an increase in the projected debits.

(3) IDEM/OAQ shall approve or request changes to the Implementation Plan update within 120 calendar days of receipt of sufficient information regarding the change for emission points included in emissions averages.

(j) The Permittee of a source, for emission points that are not included in an emissions average, shall report to IDEM/OAQ under the circumstances described in 40 CFR 63.151(j)(1), (j)(2), and (j)(3) unless the relevant information has been included and submitted in an operating permit application or amendment, or as otherwise specified by the permitting authority. The information shall be submitted within 180 calendar days after the change is made or the information regarding the change is known to the source. The update may be submitted in the next Periodic Report if the change is made after the date the Notification of Compliance Status is due.

(1) Whenever a deliberate change is made such that the group status of any emission point changes. The information submitted shall include a compliance schedule as specified in 40 CFR 63.100 if the emission point becomes Group 1.

(2) Whenever the Permittee elects to achieve compliance with 40 CFR 63, Subpart G by using a control technique other than that previously reported to IDEM/OAQ or to the permitting authority, or plans to monitor a different parameter, or operate a control device in a manner other than that previously reported.

(3) Whenever an emission point or a chemical manufacturing process unit is added to a source, written information specified under 40 CFR 63.151(e)(1) through (e)(5), containing information on the new emission point(s) shall be submitted to the EPA regional office where the source is located.

BB.17 General Reporting and Continuous Records. [326 IAC 12] [63.152, Subpart G]

(a) Pursuant to 40 CFR 63.152(a), the Permittee of a source subject to 40 CFR Part 63, Subpart G shall submit the reports listed in 40 CFR 63.152(a)(1) through 63.152(a)(5) and keep continuous records of monitored parameters as specified in 40 CFR 63.152(f). The Permittee requesting an extension of compliance shall also submit the report described in 40 CFR 63.151(a)(6).

(1) [Reserved]

(2) [Reserved]

(3) A Notification of Compliance Status described in 40 CFR 63.152(b).

(4) Periodic Reports described in 40 CFR 63.152(c).

(5) Other reports described in 40 CFR 63.152(d) and 63.152(e).

(b) Pursuant to 40 CFR 63.152(b), the Permittee submitted a Notification of Compliance Status on September 12, 1997.

(1) The notification shall include the results of any emission point group determinations, performance tests, inspections, continuous monitoring system performance evaluations, values of monitored parameters established during performance tests, and any other information used to demonstrate compliance or required to be included in the Notification of Compliance Status under 40 CFR 63.110(h) for regulatory overlaps, under 40 CFR 63.117 for process vents, 40 CFR 63.122 for storage vessels, 40 CFR 63.129 for transfer operations, 40 CFR 63.146 for process wastewater, and 40 CFR 63.150 for emission points included in an emissions average.

(i) For performance tests and group determinations that are based on measurements, the Notification of Compliance Status shall include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in 40 CFR 63.117 for process vents, and 40 CFR 63.146 for process wastewater shall be submitted, but a complete test report is not required.

(ii) A complete test report shall include a brief process description, sampling site description, description of sampling and analysis procedures and any modifications to standard procedures, quality assurance procedures, record of operating conditions during the test, record of preparation of standards, record of calibrations, raw data sheets for field sampling, raw data sheets for field and laboratory analyses, documentation of calculations, and any other information required by the test method.

(2) For each monitored parameter for which a range is required to be established under 40 CFR 63.114 for process vents, 40 CFR 63.150(m) for emission points in emissions averages, or 40 CFR 63.151(f), or 40 CFR 63.152(e), the Notification of Compliance Status shall include the information in 40 CFR 63.152(b)(2)(i), 63.152(b)(2)(ii), and 63.152(b)(2)(iii) unless the range and the operating day definition have been established in the operating permit.

(i) The specific range of the monitored parameter(s) for each emission point;

(ii) The rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control device.

(A) If a performance test is required by 40 CFR Part 63, Subpart G for a control device, the range shall be based on the parameter values measured during the performance test and may be supplemented by engineering assessments and/or manufacturer's recommendations. Performance testing is not

required to be conducted over the entire range of permitted parameter values.

(B) If a performance test is not required by 40 CFR Part 63, Subpart G for a control device, the range may be based solely on engineering assessments and/or manufacturer's recommendations.

(iii) A definition of the source's operating day for purposes of determining daily average values of monitored parameters. The definition shall specify the times at which an operating day begins and ends.

(3) For emission points included in an emissions average, the Notification of Compliance Status shall include the values of all parameters needed for input to the emission credit and debit equations in 40 CFR 63.150(g) and 63.150(h), calculated or measured according to the procedures in 40 CFR 63.150(g) and 63.150(h), and the resulting calculation of credits and debits for the first quarter of the year. The first quarter begins on the compliance date specified in 40 CFR 63.100 of Subpart F.

(4) If any emission point is subject to 40 CFR Part 63, Subpart G and to other standards as specified in 40 CFR 63.110 and if the provisions of 40 CFR 63.110 allow the Permittee to choose which testing, monitoring, reporting, and recordkeeping provisions will be followed, then the Notification of Compliance Status shall indicate which rule's requirements will be followed for testing, monitoring, reporting, and recordkeeping.

(5) [Reserved]

(6) [Reserved]

(c) Pursuant to 40 CFR 63.152(c), the Permittee of a source subject to 40 CFR Part 63, Subpart G shall submit Periodic Reports.

(1) Except as specified under 40 CFR 63.152(c)(5) and 63.152(c)(6), a report containing the information in 40 CFR 63.152(c)(2), 62.152(c)(3), and 63.152(c)(4) shall be submitted semiannually no later than 60 calendar days after the end of each 6-month period.

(2) Except as provided in 40 CFR 63.152(c)(2)(iv), for a Permittee of a source complying with the provisions of 40 CFR 63.113 through 63.147 for any emission points, Periodic Reports shall include all information specified in 40 CFR 63.117 and 63.118 for process vents, and 40 CFR 63.146 for process wastewater, including reports of periods when monitored parameters are outside their established ranges.

(i) For each parameter or parameters required to be monitored for a control device, the Permittee shall establish a range of parameter values to ensure that the device is being applied, operated and maintained properly. As specified in 40 CFR 63.152(b)(2), these parameter values and the definition of an operating day shall be approved as part of and incorporated into the source's Notification of Compliance Status or operating permit, as appropriate.

(ii) The parameter monitoring data for Group 1 emission points and emission points included in emissions averages that are required to perform continuous monitoring shall be used to determine compliance with the required operating conditions for the monitored control devices

or recovery devices. For each excursion, except for excused excursions, the Permittee shall be deemed to have failed to have applied the control in a manner that achieves the required operating conditions.

(A) An excursion means any of the three cases listed in 40 CFR 63.152(c)(2)(ii)(A)(1), 63.152(c)(2)(ii)(A)(2), or 63.152(c)(2)(ii)(A)(3). For a control device or recovery device where multiple parameters are monitored, if one or more of the parameters meets the excursion criteria in 40 CFR 63.152(c)(2)(ii)(A)(1), 63.152(c)(2)(ii)(A)(2), or 63.152(c)(2)(ii)(A)(3), this is considered a single excursion for the control device or recovery device.

(1) When the daily average value of one or more monitored parameters is outside the permitted range.

(2) When the period of control device or recovery device operation is 4 hours or greater in an operating day and monitoring data are insufficient to constitute a valid hour of data for at least 75 percent of the operating hours.

(3) When the period of control device or recovery device operation is less than 4 hours in an operating day and more than one of the hours during the period of operation does not constitute a valid hour of data due to insufficient monitoring data.

(4) Monitoring data are insufficient to constitute a valid hour of data, as used in 40 CFR 63.152(c)(2)(ii)(A)(2) and 63.152(c)(2)(ii)(A)(3), if measured values are unavailable for any of the 15-minute periods within the hour.

(B) The number of excused excursions for each control device or recovery device for each semiannual period is specified in 40 CFR 63.152(c)(2)(ii)(B)(1) through 63.152(c)(2)(ii)(B)(6). 40 CFR 63.152(c)(2)(ii)(B) applies to sources required to submit Periodic Reports semiannually or quarterly.

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) [Reserved]

(6) For the sixth and all subsequent semiannual periods - one excused excursion.

(C) A monitored parameter that is outside its established range or monitoring data that are not collected are excursions. However, if the conditions in 40 CFR 63.152(c)(2)(ii)(C)(1) or 63.152(c)(2)(ii)(C)(2) are met, these excursions are not violations and do not count toward the number of excused excursions for determining compliance.

(1) Periods of start-up, shutdown, or malfunction. During periods of start-up, shutdown, or malfunction when the source is operated during such periods in accordance with the source's start-up, shutdown, and malfunction plan as required by 40 CFR 63.6(e)(3) of Subpart A.

(2) Periods of nonoperation. During periods of nonoperation of the chemical manufacturing process unit, or portion thereof, that results in cessation of the emissions to which the monitoring applies.

(D) Nothing in 40 CFR 63.152(c)(2)(ii) shall be construed to allow or excuse a monitoring parameter excursion caused by any activity that violates other applicable provisions of 40 CFR Part 63, Subpart A, F, or G.

(E) Paragraph 40 CFR 63.152(c)(2)(ii), except 63.152(c)(2)(ii)(C), shall apply only to emission points and control devices or recovery devices for which continuous monitoring is required by 40 CFR 63.113 through 63.150.

(iii) Periodic Reports shall include the daily average values of monitored parameters for both excused and unexcused excursions, as defined in 40 CFR 63.152(c)(2)(ii)(A). For excursions caused by lack of monitoring data, the duration of periods when monitoring data were not collected shall be specified.

(iv) The provisions of 40 CFR 63.152(c)(2), 63.152(c)(2)(i), 63.152(c)(2)(ii), and 63.152(c)(2)(iii) do not apply to any storage vessel. If continuous records are required, the Permittee shall specify, in the monitoring plan, whether the provisions of 40 CFR 63.152(c)(2), 63.152(c)(2)(i), 63.152(c)(2)(ii), and 63.152(c)(2)(iii) apply.

(3) If any performance tests are reported in a Periodic Report, the following information shall be included:

(i) One complete test report shall be submitted for each test method used for a particular kind of emission point tested. A complete test report shall contain the information specified in 40 CFR 63.152(b)(1)(ii).

(ii) For additional tests performed for the same kind of emission point using the same method, results and any other information required in 40 CFR 63.117 for process vents, and 40 CFR 63.146 for process wastewater shall be submitted, but a complete test report is not required.

(4) Periodic Reports shall include the information in 40 CFR 63.152(c)(4)(i) through 63.152(c)(4)(iv), as applicable:

(i) For process vents, reports of process changes as required under 40 CFR 63.118(g), 63.118(h), 63.118(i), and 63.118(j).

(ii) Any supplements required under 40 CFR 63.151(i) and 63.151(j),

(iii) Notification if any Group 2 emission point becomes a Group 1 emission point, including a compliance schedule as required in 40 CFR 63.100 of Subpart F, and

(iv) [Reserved]

(5) The Permittee of a source shall submit quarterly reports for all emission points included in an emissions average.

(i) The quarterly reports shall be submitted no later than 60 calendar days after the end of each quarter. The first report shall be submitted with the Notification of Compliance Status no later than 5 months after the compliance date specified in 40 CFR 63.100 of Subpart F.

(ii) The quarterly reports shall include the information specified in 40 CFR 63.152(c)(5)(ii) for all emission points included in an emissions average.

(A) The credits and debits calculated each month during the quarter;

(B) A demonstration that debits calculated for the quarter are not more than 1.30 times the credits calculated for the quarter, as required under 40 CFR 63.150(e)(4).

(C) The values of any inputs to the credit and debit equations in 40 CFR 63.150(g) and 63.150(h) of that change from month to month during the quarter or that have changed since the previous quarter;

(D) Results of any performance tests conducted during the reporting period including one complete report for each test method used for a particular kind of emission point as described in 40 CFR 63.152(c)(3);

(E) Reports of daily average values of monitored parameters for both excused and unexcused excursions as defined in 40 CFR 63.152(c)(2)(ii)(A). For excursions caused by lack of monitoring data, the duration of periods when monitoring data were not collected shall be specified.

(iii) Sections 40 CFR 63.152(c)(2)(i) through 63.152(c)(2)(iii) shall govern the use of monitoring data to determine compliance for Group 1 and Group 2 points included in emissions averages. For storage vessels to which the provisions of 40 CFR 63.152(c)(2)(i) through 63.152(c)(2)(iii) do not apply (as specified in 40 CFR 63.152(c)(2)(iv)), the Permittee is required to comply with the provisions of the applicable monitoring plan, and monitoring records may be used to determine compliance.

(iv) Every fourth quarterly report shall include the following:

(A) A demonstration that annual credits are greater than or equal to annual debits as required by 40 CFR 63.150(e)(3); and

(B) A certification of compliance with all the emissions averaging provisions in 40 CFR 63.150.

(6) The Permittee of a source shall submit reports quarterly for particular emission points not included in an emissions average under the circumstances described in 40 CFR 63.152(c)(6)(i) through 63.152(c)(6)(v)

(i) The Permittee of a source subject to 40 CFR Part 63, Subpart G shall submit quarterly reports for a period of one year for an emission point that is not included in an emissions average if:

(A) The emission point has more excursions, as defined in 40 CFR 63.152(c)(2)(ii), than the number of excused excursions allowed under 40 CFR 63.152(c)(2)(ii)(B) for a semiannual reporting period; and

(B) IDEM, OAQ requests the Permittee to submit quarterly reports for the emission point.

(ii) The quarterly reports shall include all information in 40 CFR 63.152(c)(2), 63.152(c)(3), and 63.152(c)(4) applicable to the emission point(s) for which quarterly reporting is required under 40 CFR 63.152(c)(6)(i). Information applicable to other emission points within the source shall be submitted in the semiannual reports required under 40 CFR 63.152(c)(1).

(iii) Quarterly reports shall be submitted no later than 60 calendar days after the end of each quarter.

(iv) After quarterly reports have been submitted for an emission point for one year, the Permittee may return to semiannual reporting for the emission point unless IDEM, OAQ requests the Permittee to continue to submit quarterly reports.

(v) Sections 40 CFR 63.152(c)(2)(i) through 63.152(c)(2)(iii) shall govern the use of monitoring data to determine compliance for Group 1 emission points. For storage vessels to which the provisions of 40 CFR 63.152(c)(2)(i) through 63.152(c)(2)(iii) do not apply (as specified in 40 CFR 63.152(c)(2)(iv)), the Permittee is required to comply with the provisions of the applicable monitoring plan, and monitoring records may be used to determine compliance.

(d) Pursuant to 40 CFR 63.152(d), other reports shall be submitted as specified in Part 63, Subpart A or in 40 CFR 63.113 through 63.151. These reports are:

(1) Reports of start-up, shutdown, and malfunction required by 40 CFR 63.10(d)(5) of Subpart A. The start-up, shutdown and malfunction reports may be submitted on the same schedule as the Periodic Reports required under 40 CFR 63.152(c) instead of the schedule specified in 40 CFR 63.10(d)(5) of Subpart A.

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(e) Pursuant to 40 CFR 63.152(e), a Permittee subject to 40 CFR Part 63, Subpart G shall submit the information specified in 40 CFR 63.152(e)(1) through 63.152(e)(4) with the operating permit application or as otherwise specified by IDEM, OAQ. The Permittee shall submit written updates as amendments to the operating permit application on the schedule and under the circumstances described in 40 CFR 63.151(j). Notwithstanding, if the Permittee has an operating permit under 40 CFR Part 70 or 71, the Permittee shall follow the schedule and format required by IDEM, OAQ.

(1) The information specified in 40 CFR 63.151(f) or 63.151(g) for any emission points for which the Permittee requests approval to monitor a unique parameter or use an alternative monitoring and recording system, and

(2) The information specified in 40 CFR 63.151(d) for points included in an emissions average.

(3) The information specified in 40 CFR 63.151(e) for points not included in an emissions average.

(4) The information specified in 40 CFR 63.151(h) as applicable.

(f) Pursuant to 40 CFR 63.152(f), a Permittee required to keep continuous records by 40 CFR 63.118, 63.147, 63.150, or other sections of 40 CFR Part 63, Subpart G shall keep records as specified in 40 CFR 63.152(f)(1) through 63.152(f)(7), unless an alternative recordkeeping system has been requested and approved under 40 CFR 63.152(e) or under 63.8(f) of Subpart A, and except as provided in 40 CFR 63.152(c)(2)(ii)(C) or 63.152(g).

(1) The monitoring system shall measure data values at least once every 15 minutes.

(2) The Permittee shall record either:

(i) Each measured data value; or

(ii) Block average values for 15-minute or shorter periods calculated from all measured data values during each period or at least one measured data value per minute if measured more frequently than once per minute.

(3) If the daily average value of a monitored parameter for a given operating day is within the range established in the Notification of Compliance Status or operating permit, the Permittee shall either:

(i) Retain block hourly average values for that operating day for 5 years and discard, at or after the end of that operating day, the 15-minute or more frequent average values and readings recorded under 40 CFR 63.152(f)(2); or

(ii) Retain the data recorded in 40 CFR 63.152(f)(2) for 5 years.

(4) If the daily average value of a monitored parameter for a given operating day is outside the range established in the Notification of Compliance Status or operating permit, the Permittee shall retain the data recorded that operating day under 40 CFR 63.152(f)(2) for 5 years.

(5) Daily average values of each continuously monitored parameter shall be calculated for each operating day, and retained for 5 years, except as specified in 40 CFR 63.152(f)(6) and 63.152(f)(7).

(i) The daily average shall be calculated as the average of all values for a monitored parameter recorded during the operating day. The average shall cover a 24-hour period if operation is continuous, or the number of hours of operation per operating day if operation is not continuous.

(ii) The operating day shall be the period defined in the operating permit or the Notification of Compliance Status. It may be from midnight to midnight or another daily period.

(6) If all recorded values for a monitored parameter during an operating day are within the range established in the Notification of Compliance Status or operating permit, the Permittee may record that all values were within the range and retain this record for 5 years rather than calculating and recording a daily average for

that operating day. For these operating days, the records required in 40 CFR 63.152(f)(3) shall also be retained for 5 years.

(7) Monitoring data recorded during periods identified in 40 CFR 63.152(f)(7)(i) through 63.152(f)(7)(v) shall not be included in any average computed under 40 CFR Part 63, Subpart G. Records shall be kept of the times and durations of all such periods and any other periods during process or control device operation when monitors are not operating.

(i) Monitoring system breakdowns, repairs, calibration checks, and zero (low-level) and high-level adjustments;

(ii) Start-ups;

(iii) Shutdowns;

(iv) Malfunctions;

(v) Periods of non-operation of the chemical manufacturing process unit (or portion thereof), resulting in cessation of the emissions to which the monitoring applies.

(g) Pursuant to 40 CFR 63.152(g), for any parameter with respect to any item of equipment, the Permittee may implement the recordkeeping requirements in 40 CFR 63.152(g)(1) or 63.152(g)(2) as alternatives to the continuous operating parameter monitoring and recordkeeping provisions listed in 40 CFR 63.114, 63.117, and 63.118 for process vents, 63.146, and 63.147 for wastewater, and/or 40 CFR 63.152(f), except that 40 CFR 63.152(f)(7) shall apply. The Permittee shall retain each record required by 40 CFR 63.152(g)(1) or 63.152(g)(2) as provided in 40 CFR 63.103(c) of Subpart F, except as provided otherwise in 40 CFR 63.152(g)(1) or 63.152(g)(2).

(1) The Permittee may retain only the daily average value, and is not required to retain more frequent monitored operating parameter values, for a monitored parameter with respect to an item of equipment, if the requirements of 40 CFR 63.152(g)(1)(i) through 63.152(g)(1)(vi) are met. A Permittee electing to comply with the requirements of 40 CFR 63.152(g)(1) shall notify IDEM, OAQ in the Notification of Compliance Status or, if the Notification of Compliance Status has already been submitted, in the periodic report immediately preceding implementation of the requirements of 40 CFR 63.152(g)(1).

(i) The monitoring system is capable of detecting unrealistic or impossible data during periods of operation other than startups, shutdowns, or malfunctions (e.g., a temperature reading of -200 □C on a boiler), and will alert the operator by alarm or other means. The Permittee shall record the occurrence. All instances of the alarm or other alert in an operating day constitute a single occurrence.

(ii) The monitoring system generates, updated at least hourly throughout each operating day, a running average of the monitoring values that have been obtained during that operating day, and the capability to observe this average is readily available to IDEM, OAQ on-site during the operating day. The Permittee shall record the occurrence of any period meeting the criteria in 40 CFR 63.152(g)(1)(ii)(A) through 63.152(g)(1)(iii)(C). All instances in an operating day constitute a single occurrence.

(A) The running average is above the maximum or below the minimum established limits;

(B) The running average is based on at least 6 1-hour average values; and

(C) The running average reflects a period of operation other than a startup, shutdown, or malfunction.

(iii) The monitoring system is capable of detecting unchanging data during periods of operation other than startups, shutdowns, or malfunctions, except in circumstances where the presence of unchanging data is the expected operating condition based on past experience (e.g., pH in some scrubbers), and will alert the operator by alarm or other means. The Permittee shall record the occurrence. All instances of the alarm or other alert in an operating day constitute a single occurrence.

(iv) The monitoring system will alert the Permittee by an alarm or other means, if the running average parameter value calculated under 40 CFR 63.152(g)(1)(ii) reaches a set point that is appropriately related to the established limit for the parameter that is being monitored.

(v) The Permittee shall verify the proper functioning of the monitoring system, including its ability to comply with the requirements of 40 CFR 63.152(g)(1), at the times specified in 40 CFR 63.152(g)(1)(v)(A) through 63.152(g)(1)(v)(C). The Permittee shall document that the required verifications occurred.

(A) Upon initial installation.

(B) Annually after initial installation.

(C) After any change to the programming or equipment constituting the monitoring system, which might reasonably be expected to alter the monitoring system's ability to comply with the requirements of 40 CFR 63.152.

(vi) The Permittee shall retain the records identified in 40 CFR 63.152(g)(1)(vi)(A) through 63.152(g)(1)(vi)(C)

(A) Identification of each parameter, for each item of equipment, for which the Permittee has elected to comply with the requirements of 40 CFR 63.152(g).

(B) A description of the applicable monitoring system(s), and of how compliance will be achieved with each requirement of 40 CFR 63.152(g)(1)(i) through 63.152(g)(1)(v). The description shall identify the location and format (e.g., on-line storage; log entries) for each required record. If the description changes, the Permittee shall retain both the current and the most recent superseded description. The description, and the most recent superseded description, shall be retained as provided in 40 CFR 63.103(c) of Subpart F, except as provided in 40 CFR 63.152(g)(1)(vi)(D).

(C) A description, and the date, of any change to the monitoring system that would reasonably be expected to affect its ability to comply with the requirements of 40 CFR 63.152(g)(1).

(D) Permittees subject to 40 CFR 63.152(g)(1)(vi)(B) shall retain the current description of the monitoring system as long as the description is current, but not less than 5 years from the date of its creation. The current description shall, at all times, be retained on-site or be accessible from a central location by computer or other means that provides access within 2 hours after a request. The Permittee shall retain the most recent superseded description at least until 5 years from the date of its creation. The superseded description shall be retained on-site (or accessible from a central location by computer that provides access within 2 hours after a request) at least 6 months after its creation. Thereafter, the superseded description may be stored off-site.

(2) If a Permittee has elected to implement the requirements of 40 CFR 63.152(g)(1) and a period of 6 consecutive months has passed without an excursion as defined in 40 CFR 63.152(g)(2)(iv), the Permittee is no longer required to record the daily average value for that parameter for that unit of equipment, for any operating day when the daily average value is less than the maximum, or greater than the minimum established limit. With approval by IDEM, OAQ, monitoring data generated prior to the compliance date of 40 CFR Part 63, Subpart G shall be credited toward the period of 6 consecutive months, if the parameter limit and the monitoring was required and/or approved by IDEM, OAQ.

(i) If the Permittee elects not to retain the daily average values, the Permittee shall notify IDEM, OAQ in the next periodic report. The notification shall identify the parameter and unit of equipment.

(ii) If, on any operating day after the Permittee has ceased recording daily averages as provided in 40 CFR 63.152(g)(2), there is an excursion as defined in 40 CFR 63.152(g)(2)(iv), the Permittee shall immediately resume retaining the daily average value for each day, and shall notify IDEM, OAQ in the next periodic report. The Permittee shall continue to retain each daily average value until another period of 6 consecutive months has passed without an excursion as defined in 40 CFR 63.152(g)(2)(iv).

(iii) The Permittee shall retain the records specified in 40 CFR 63.152(g)(1)(i), 63.152(g)(1)(ii), 63.152(g)(1)(iii), 63.152(g)(1)(iv), 63.152(g)(1)(v), and 63.152(g)(1)(vi). For any calendar week, if compliance with 40 CFR 63.152(g)(1)(i), 63.152(g)(1)(ii), 63.152(g)(1)(iii), and 63.152(g)(1)(iv) does not result in retention of a record of at least one occurrence or measured parameter value, the Permittee shall record and retain at least one parameter value during a period of operation other than a startup, shutdown, or malfunction.

(iv) For purposes of 40 CFR 63.152(g), an excursion means that the daily average value of monitoring data for a parameter is greater than the maximum, or less than the minimum established value, except as provided in 40 CFR 63.152(g)(2)(iv)(A) and 63.152(g)(2)(iv)(B).

(A) The daily average value during any start-up, shutdown, or malfunction shall not be considered an excursion for purposes of 40 CFR 63.152(g)(2), if the Permittee follows the applicable provisions of the startup, shutdown, and malfunction plan required by 40 CFR 63.6(e)(3) of Subpart A.

(B) An excused excursion, as described in 40 CFR 63.152(c)(2)(ii)(B) and 63.152(c)(2)(ii)(C), shall not be considered an excursion for purposes of 40 CFR 63.152(g)(2).

SECTION CC 40 CFR Part 63, Subpart H - National Emission Standards for Organic Hazardous Air Pollutants for Equipment Leaks

Definitions contained in 40 CFR Part 63, Subpart H, Section 161 are applicable to the Permittee.

Emissions Limitations and Standards [326 IAC 2-7-5(1)]

CC.1 Standards: General [326 IAC 14][40 CFR 63.162 Subpart H]

(a) Pursuant to 40 CFR 63.162(a), compliance with 40 CFR Part 63, Subpart H will be determined by review of the records required by 40 CFR 63.181 and the reports required by 63.182, review of performance test results, and by inspections.

(b) Pursuant to 40 CFR 63.162(b),

(1) The permittee may request a determination of alternative means of emission limitation to the requirements of 40 CFR 63.163 through 63.170, and 40 CFR 63.172 through 63.174 as provided in 40 CFR 63.177.

(2) IDEM, OAQ will make a determination that a means of emission limitation is a permissible alternative to the requirements of 40 CFR 63.163 through 63.170, and CFR 63.172 through 63.174, the permittee shall comply with the alternative.

(c) Pursuant to 40 CFR 63.162(c), each piece of equipment in a process unit to which 40 CFR Part 63, Subpart H applies shall be identified such that it can be distinguished readily from equipment that is not subject to 40 CFR Part 63, Subpart H. Identification of the equipment does not require physical tagging of the equipment. For example, the equipment may be identified on a plant site plan, in log entries, or by designation of process unit boundaries by some form of weatherproof identification.

(d) Pursuant to 40 CFR 63.162(d), equipment that is in vacuum service is excluded from the requirements of 40 CFR Part 63, Subpart H.

(e) Pursuant to 40 CFR 63.162(e), equipment that is in organic HAP service less than 300 hours per calendar year is excluded from the requirements of 40 CFR 63.163 through 63.174 of and 40 CFR 63.178 if it is identified as required in 40 CFR 63.181(j).

(f) Pursuant to 40 CFR 63.162(f), when each leak is detected as specified in 40 CFR 63.163 and 63.164; 40 CFR 63.168 and 63.169; and 40 CFR 63.172 through 63.174, the following requirements apply:

(1) Clearly identify the leaking equipment.

(2) The identification on a valve may be removed after it has been monitored as specified in 40 CFR 63.168(f)(3), and 63.175(e)(7)(i)(D), and no leak has been detected during the follow-up monitoring. If the permittee elects to comply using the provisions of 40 CFR 63.174(c)(1)(i), the identification on a connector may be removed after it is monitored as specified in 40 CFR 63.174(c)(1)(i) and no leak is detected during that monitoring.

(3) The identification which has been placed on equipment determined to have a leak, except for a valve or for a connector that is subject to the provisions of 40 CFR 63.174(c)(1)(i), may be removed after it is repaired.

(g) Pursuant to 40 CFR 63.162(g), except as provided in 40 CFR 63.162(g)(1), all terms in 40 CFR Part 63, Subpart H that define a period of time for completion of required tasks (e.g., weekly, monthly, quarterly, annual), refer to the standard calendar periods unless specified otherwise in the section or subsection that imposes the requirement.

(1) If the initial compliance date does not coincide with the beginning of the standard calendar period, the permittee may elect to utilize a period beginning on the compliance date, or may elect to comply in accordance with the provisions of 40 CFR 63.162(g)(2) or (g)(3).

(2) Time periods specified in 40 CFR Part 63, Subpart H for completion of required tasks may be changed by mutual agreement between the permittee and IDEM, OAQ, as specified in 40 CFR Part 63, Subpart A. For each time period that is changed by agreement, the revised period shall remain in effect until it is changed. A new request is not necessary for each recurring period.

(3) Except as provided in 40 CFR 63.162(g)(1) or (g)(2), where the period specified for compliance is a standard calendar period, if the initial compliance date does not coincide with the beginning of the calendar period, compliance shall be required according to the schedule specified in 40 CFR 63.162(g)(3)(i) or (g)(3)(ii), as appropriate.

(i) Compliance shall be required before the end of the standard calendar period within which the compliance deadline occurs, if there remain at least 3 days for tasks that must be performed weekly, at least 2 weeks for tasks that must be performed monthly, at least 1 month for tasks that must be performed each quarter, or at least 3 months for tasks that must be performed annually; or

(ii) In all other cases, compliance shall be required before the end of the first full standard calendar period after the period within which the initial compliance deadline occurs.

(4) In all instances where a provision of 40 CFR Part 63, Subpart H requires completion of a task during each of multiple successive periods, the permittee may perform the required task at any time during each period, provided the task is conducted at a reasonable interval after completion of the task during the previous period.

(h) Pursuant to 40 CFR 63.162(h), in all cases where the provisions of 40 CFR Part 63, Subpart H require the permittee to repair leaks by a specified time after the leak is detected, it is a violation of 40 CFR Part 63, Subpart H to fail to take action to repair the leaks within the specified time. If action is taken to repair the leaks within the specified time, failure of that action to successfully repair the leak is not a violation of 40 CFR Part 63, Subpart H. However, if the repairs are unsuccessful, a leak is detected and the permittee shall take further action as required by applicable provisions of 40 CFR Part 63, Subpart H.

CC.2 Standards: Pumps in Light Liquid Service [326 IAC 14][40 CFR 63.163 Subpart H]

(a) Pursuant to 40 CFR 63.163(a), pumps in light liquid service must implement the provisions of 40 CFR 63.163.

(1) The provisions are to be implemented on the dates specified in the specific Subpart in 40 CFR Part 63 that references Subpart H in the phases specified below:

(i) For each group of existing process units at existing sources subject to the provisions of 40 CFR 63 Subparts F or I, the phases of the standard are:

(A) Phase I, beginning on the compliance date;

(B) Phase II, beginning no later than 1 year after the compliance date; and

(C) Phase III, beginning no later than 2 ½ years after the compliance date.

(ii) For new sources subject to the provisions of 40 CFR 63 Subparts F or I, the applicable phases of the standard are:

(A) After initial start-up, comply with the Phase II requirements; and

(B) Beginning no later than 1 year after initial start-up, comply with the Phase III requirements.

(2) The Permittee of a source subject to the provisions of 40 CFR 63 Subparts F or I, may elect to meet the requirements of a later phase during the time period specified for an earlier phase.

(3) Sources subject to other Subparts in 40 CFR Part 63 that reference Subpart H shall comply on the dates specified in the applicable Subpart.

(b) (1) Pursuant to 40 CFR63.163(b), the Permittee of a process unit subject to 40 CFR 63 Subpart H shall monitor each pump monthly to detect leaks by the method specified in 40 CFR 63.180(b), and shall comply with the requirements of 40 CFR 63.163(a) through 63.163(d), except as provided in 40 CFR 63.162(b) and 63.163(e) through 63.163(j).

(2) The instrument reading, as determined by the method as specified in 40 CFR 63.180(b) of Subpart H, that defines a leak in each phase of the standard is:

(i) For Phase I, an instrument reading of 10,000 parts per million or greater.

(ii) For Phase II, an instrument reading of 5,000 parts per million or greater.

(iii) For Phase III, an instrument reading of:

(A) 5,000 parts per million or greater for pumps handling polymerizing monomers;

(B) 2,000 parts per million or greater for pumps in food/medical service; and

(C) 1,000 parts per million or greater for all other pumps.

(3) Each pump shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. If there are indications of liquids dripping from the pump seal, a leak is detected.

(c) (1) Pursuant to 40 CFR 63.163(c), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.163(c)(3) or 63.171.

(2) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected. First attempts at repair include, but are not limited to, the following practices where practicable:

(i) Tightening of packing gland nuts.

(ii) Ensuring that the seal flush is operating at design pressure and temperature.

(3) For pumps in Phase III to which a 1,000 parts per million leak definition applies, repair is not required unless an instrument reading of 2,000 parts per million or greater is detected.

(d) (1) Pursuant to 40 CFR 63.163(d)(1), the Permittee shall decide no later than the first monitoring period whether to calculate percent leaking pumps on a process unit basis or on a source-wide basis. Once the Permittee has decided, all subsequent percent calculations shall be made on the same basis.

(2) If, in Phase III, calculated on a 6-month rolling average, the greater of either 10 percent of the pumps in a process unit or three pumps in a process unit leak, the Permittee shall implement a quality improvement program for pumps that complies with the requirements of 40 CFR 63.176.

(3) The number of pumps at a process unit shall be the sum of all the pumps in organic HAP service, except that pumps found leaking in a continuous process unit within 1 month after start-up of the pump shall not count in the percent leaking pumps calculation for that one monitoring period only.

(4) Percent leaking pumps shall be determined by the following equation:

$$\%P_L=((P_L-P_S)/(P_T-P_S))\times 100$$

where:

%PL = Percent leaking pumps

PL = Number of pumps found leaking as determined through monthly monitoring as required in 40 CFR 63.163(b)(1) and 63.163(b)(2)

PT = Total pumps in organic HAP service, including those meeting the criteria in 40 CFR 63.163(e) and 63.163(f).

PS = Number of pumps leaking within 1 month of start-up during the current monitoring period.

(e) Pursuant to 40 CFR63.163(e), each pump equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of 40 CFR 63.163(a) through 63.163(d), provided the following requirements are met:

(1) Each dual mechanical seal system is:

(i) Operated with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure; or

(ii) Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or

(iii) Equipped with a closed-loop system that purges the barrier fluid into a process stream.

(2) The barrier fluid is not in light liquid service.

(3) Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(4) Each pump is checked by visual inspection each calendar week for indications of liquids dripping from the pump seal.

(i) If there are indications of liquids dripping from the pump seal at the time of the weekly inspection, the pump shall be monitored as specified in 40 CFR 63.180(b) to determine if there is a leak of organic HAP in the barrier fluid.

(ii) If an instrument reading of 1,000 parts per million or greater is measured, a leak is detected.

(5) Each sensor as described in 40 CFR 63.163(e)(3) is observed daily or is equipped with an alarm unless the pump is located within the boundary of an unmanned plant site.

(6) (i) The Permittee determines, based on design considerations and operating experience, criteria applicable to the presence and frequency of drips and to the sensor that indicates failure of the seal system, the barrier fluid system, or both.

(ii) If indications of liquids dripping from the pump seal exceed the criteria established in 40 CFR 63.163(e)(6)(i) or if, based on the criteria established in 40 CFR 63.163(e)(6)(i), the sensor indicates failure of the seal system, the barrier fluid system, or both, a leak is detected.

(iii) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.171.

(iv) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(f) Pursuant to 40 CFR63.163(f), any pump that is designed with no externally actuated shaft penetrating the pump housing is exempt from the requirements of 40 CFR 63.163(a) through 63.163(c).

(g) Pursuant to 40 CFR63.163(g), any pump equipped with a closed-vent system capable of capturing and transporting any leakage from the seal or seals to a process or to a fuel gas system or to a control device that complies with the requirements of 40 CFR 63.172 is exempt from the requirements of 40 CFR 63.163(b) through 63.163(e).

(h) Pursuant to 40 CFR63.163(h), any pump that is located within the boundary of an unmanned plant site is exempt from the weekly visual inspection requirement of 40 CFR 63.163(b)(3) and 63.163(e)(4), and the daily requirements of 40 CFR 63.163(e)(5), provided that each pump is visually inspected as often as practicable and at least monthly.

(i) Pursuant to 40 CFR63.163(i), if more than 90 percent of the pumps at a process unit meet the criteria in either 40 CFR 63.163(e) or 63.163(f), the process unit is exempt from the requirements of 40 CFR 63.163(d).

(j) Pursuant to 40 CFR63.163(j), any pump that is designated, as described in 40 CFR 63.181(b)(7)(i), as an unsafe-to-monitor pump is exempt from the requirements of 40 CFR 63.163(b) through 63.163(e) if:

(1) The Permittee of the pump determines that the pump is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.163(b) through 63.163(d); and

(2) The Permittee of the pump has a written plan that requires monitoring of the pump as frequently as practical during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable.

CC.3 Standards: Compressors [326 IAC 14][40 CFR 63.164, Subpart H]

(a) Pursuant to 40 CFR 63.164(a), each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of process fluid to the atmosphere, except as provided in 40 CFR 63.162(b), 63.164(h) and 63.164(i).

(b) Pursuant to 40 CFR 63.164(b), each compressor seal system as required in 40 CFR 63.164(a) shall be:

(1) Operated with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or

(2) Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or

(3) Equipped with a closed-loop system that purges the barrier fluid directly into a process stream.

(c) Pursuant to 40 CFR 63.164(c), the barrier fluid shall not be in light liquid service.

(d) Pursuant to 40 CFR 63.164(d), each barrier fluid system as described in 40 CFR 63.164(a) through 63.164(c) shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both.

(e) (1) Pursuant to 40 CFR 63.164(e), each sensor as required in 40 CFR 63.164(d) shall be observed daily or shall be equipped with an alarm unless the compressor is located within the boundary of an unmanned plant site.

(2) The Permittee shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(f) Pursuant to 40 CFR 63.164(f), if the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined under 40 CFR 63.164(e)(2), a leak is detected.

(g) (1) Pursuant to 40 CFR 63.164(g), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.171.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(h) Pursuant to 40 CFR 63.164(h), a compressor is exempt from the requirements of 40 CFR 63.164(a) through 63.164(g) if it is equipped with a closed-vent system to capture and transport leakage from the compressor drive shaft seal back to a process or a fuel gas system or to a control device that complies with the requirements of 40 CFR 63.172.

(i) Pursuant to 40 CFR 63.164(i), any compressor that is designated, as described in 40 CFR 63.181(b)(2)(ii), to operate with an instrument reading of less than 500 parts per

million above background, is exempt from the requirements of 40 CFR 63.164(a) through 63.164(h) if the compressor:

(1) Is demonstrated to be operating with an instrument reading of less than 500 parts per million above background, as measured by the method specified in 40 CFR 63.180(c); and

(2) Is tested for compliance with 40 CFR 63.164(i)(1) initially upon designation, annually, and at other times requested by the IDEM, OAQ.

CC.4 Standards: Pressure Relief Devices in Gas/Vapor Service [326 IAC 14][40 CFR 63.165, Subpart H]

(a) Pursuant to 40 CFR 63.165(a), except during pressure releases, each pressure relief device in gas/vapor service shall be operated with an instrument reading of less than 500 parts per million above background except as provided in 40 CFR 63.165(b), as measured by the method specified in 40 CFR 63.180(c).

(b) (1) Pursuant to 40 CFR 63.165(b), after each pressure release, the pressure relief device shall be returned to a condition indicated by an instrument reading of less than 500 parts per million above background, as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171.

(2) No later than 5 calendar days after the pressure release and being returned to organic HAP service, the pressure relief device shall be monitored to confirm the condition indicated by an instrument reading of less than 500 parts per million above background, as measured by the method specified in 40 CFR 63.180(c).

(c) Pursuant to 40 CFR 63.165(c), any pressure relief device that is routed to a process or fuel gas system or equipped with a closed-vent system capable of capturing and transporting leakage from the pressure relief device to a control device as described in 40 CFR 63.172 is exempt from the requirements of 40 CFR 63.165(a) and 63.165(b).

(d) (1) Pursuant to 40 CFR 63.165(d), any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of 40 CFR 63.165(a) and 63.165(b), provided the Permittee complies with the requirements in 40 CFR 63.165(d)(2).

(2) After each pressure release, a rupture disk shall be installed upstream of the pressure relief device as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171.

CC.5 Standards: Sampling Connection Systems [326 IAC 14][40 CFR 63.166, Subpart H]

(a) Pursuant to 40 CFR 63.166(a), each sampling connection system shall be equipped with a closed-purge, closed-loop, or closed-vent system, except as provided in 40 CFR 63.162(b). Gases displaced during filling of the sample container are not required to be collected or captured.

(b) Pursuant to 40 CFR 63.166(b), each closed-purge, closed-loop, or closed-vent system as required in 40 CFR 63.166(a) shall:

(1) Return the purged process fluid directly to the process line; or

(2) Collect and recycle the purged process fluid to a process; or

(3) Be designed and operated to capture and transport the purged process fluid to a control device that complies with the requirements of 40 CFR 63.172; or

(4) Collect, store, and transport the purged process fluid to a system or facility identified in 40 CFR 63.166(b)(4)(i), 63.166(b)(4)(ii), or 63.166(b)(4)(iii).

(i) A waste management unit as defined in 40 CFR 63.111 of Subpart, if the waste management unit is subject to, and operated in compliance with the provisions of 40 CFR Subpart G applicable to group 1 wastewater streams. If the purged process fluid does not contain any organic HAP listed in Table 9 of Subpart G of Part 63, the waste management unit need not be subject to, and operated in compliance with the requirements of 40 CFR Part 63, Subpart G applicable to group 1 wastewater streams provided the facility has an NPDES permit or sends the wastewater to an NPDES permitted facility.

(ii) A treatment, storage, or disposal facility subject to regulation under 40 CFR part 262, 264, 265, or 266; or

(iii) A facility permitted, licensed, or registered by a State to manage municipal or industrial solid waste, if the process fluids are not hazardous waste as defined in 40 CFR part 261.

(c) Pursuant to 40 CFR 63.166(c), in-situ sampling systems and sampling systems without purges are exempt from the requirements of 40 CFR 63.166(a) and 63.166(b).

CC.6 Standards: Open-Ended Valves or Lines [326 IAC 14][40 CFR 63.167, Subpart H]

(a) (1) Pursuant to 40 CFR 63.167(a), each open-ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve, except as provided in 40 CFR 63.162(b), 63.167(d), and 63.167(e).

(2) The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring process fluid flow through the open-ended valve or line, or during maintenance or repair.

(b) Pursuant to 40 CFR 63.167(b), each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed.

(c) Pursuant to 40 CFR 63.167(c), when a double block and bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with 40 CFR 63.167(a) at all other times.

(d) Pursuant to 40 CFR 63.167(d), open-ended valves or lines in an emergency shutdown system which are designed to open automatically in the event of a process upset are exempt from the requirements of 40 CFR 63.167(a), 63.167(b) and 63.167(c).

(e) Pursuant to 40 CFR 63.167(e), open-ended valves or lines containing materials which would autocatalytically polymerize or, would present an explosion, serious overpressure, or other safety hazard if capped or equipped with a double block and bleed system as specified in 40 CFR 63.167(a) through 63.167(c) are exempt from the requirements of 40 CFR 63.167(a) through 63.167(c).

CC.7 Standards: Valves in Gas/Vapor Service and in Light Liquid Service [326 IAC 14][40 CFR 63.168, Subpart H]

(a) (1) Pursuant to 40 CFR 63.168(a)(1), the provisions are to be implemented on the dates set forth in the specific Subpart in 40 CFR Part 63 that references Subpart H as specified in 40 CFR 63.168(a)(1)(i), 63.168(a)(1)(ii), or 63.168(a)(1)(iii).

(i) For each group of existing process units at existing sources subject to the provisions of 40 CFR 63 Subpart F or I, the phases of the standard are:

(A) Phase I, beginning on the compliance date;

(B) Phase II, beginning no later than 1 year after the compliance date; and

(C) Phase III, beginning no later than 2 ½ years after the compliance date.

(ii) For new sources subject to the provisions of 40 CFR Subpart F or I, the applicable phases of the standard are:

(A) After initial start-up, comply with the Phase II requirements; and

(B) Beginning no later than 1 year after initial start-up, comply with the Phase III requirements.

(iii) Sources subject to other Subparts in 40 CFR Part 63 that reference 40 CFR 63 Subpart H shall comply on the dates specified in the applicable Subpart.

(2) The Permittee of a source subject to 40 CFR 63 Subpart H may elect to meet the requirements of a later phase during the time period specified for an earlier phase.

(3) The use of monitoring data generated before April 22, 1994 to qualify for less frequent monitoring is governed by the provisions of 40 CFR 63.180(b)(6).

(b) Pursuant to 40 CFR 63.168(b), the Permittee of a source subject to 40 CFR 63 shall monitor all valves, except as provided in 40 CFR 63.162(b), 63.168(h), and 63.168(i), at the intervals specified in 40 CFR 63.168(c) and 63.168(d) and shall comply with all other provisions 40 CFR 63.168, except as provided in 40 CFR 63.171, and 63.179.

(1) The valves shall be monitored to detect leaks by the method specified in 40 CFR 63.180(b).

(2) The instrument reading that defines a leak in each phase of the standard is:

(i) For Phase I, an instrument reading of 10,000 parts per million or greater.

(ii) For Phase II, an instrument reading of 500 parts per million or greater.

(iii) For Phase III, an instrument reading of 500 parts per million or greater.

(c) Pursuant to 40 CFR 63.168(c), in Phases I and II, each valve shall be monitored quarterly.

(d) Pursuant to 40 CFR 63.168(d), in Phase III, the Permittee shall monitor valves for leaks at the intervals specified below:

(1) At process units with 2 percent or greater leaking valves, calculated according to 40 CFR 63.168(e), the Permittee shall either:

(i) Monitor each valve once per month; or

(ii) [Reserved]

(2) At process units with less than 2 percent leaking valves, the Permittee shall monitor each valve once each quarter, except as provided in 40 CFR 63.168(d)(3) and 63.168(d)(4).

(3) At process units with less than 1 percent leaking valves, the Permittee may elect to monitor each valve once every 2 quarters.

(4) At process units with less than 0.5 percent leaking valves, the Permittee may elect to monitor each valve once every 4 quarters.

(e) (1) Pursuant to 40 CFR 63.168(e), percent leaking valves at a process unit shall be determined by the following equation:

$$\%V_L=(V_L/(V_T+V_C))\times 100$$

where:

%VL = Percent leaking valves as determined through periodic monitoring required in 40 CFR 63.168(b) through 63.168(d).

VL = Number of valves found leaking excluding nonrepairables as provided in 40 CFR 63.168(e)(3)(i).

VT = Total valves monitored, in a monitoring period excluding valves monitored as required by 40 CFR 63.168(f)(3).

VC = Optional credit for removed valves=0.67 × net number (i.e., total removed-total added) of valves in organic HAP service removed from process unit after the date set forth in 40 CFR 63.100(k) of Subpart F for existing process units, and after the date of initial start-up for new sources. If credits are not taken, then VC=0.

(2) For use in determining monitoring frequency, as specified in 40 CFR 63.168(d), the percent leaking valves shall be calculated as a rolling average of two consecutive monitoring periods for monthly, quarterly, or semiannual monitoring programs; and as an average of any three out of four consecutive monitoring periods for annual monitoring programs.

(3) (i) Nonrepairable valves shall be included in the calculation of percent leaking valves the first time the valve is identified as leaking and nonrepairable and as required to comply with 40 CFR 63.168(e)(3)(ii). Otherwise, a number of nonrepairable valves (identified and included in the percent leaking calculation in a previous period) up to a maximum of 1 percent of the total number of valves in organic HAP service at a process unit may be excluded from calculation of percent leaking valves for subsequent monitoring periods.

(ii) If the number of nonrepairable valves exceeds 1 percent of the total number of valves in organic HAP service at a process unit, the number of nonrepairable valves exceeding 1 percent of the total number of valves in organic HAP service shall be included in the calculation of percent leaking valves.

(f) (1) Pursuant to 40 CFR 63.168(f), when a leak is detected, it shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(3) When a leak has been repaired, the valve shall be monitored at least once within the first 3 months after its repair.

(i) The monitoring shall be conducted as specified in 40 CFR 63.180(b) and 63.180(c) as appropriate, to determine whether the valve has resumed leaking.

(ii) Periodic monitoring required by 40 CFR 63.168(b) through 63.168(d) may be used to satisfy the requirements of 40 CFR 63.168(f)(3), if the timing of the monitoring period coincides with the time specified in 40 CFR 63.168(f)(3). Alternatively, other monitoring may be performed to satisfy the requirements of 40 CFR 63.168(f)(3), regardless of whether the timing of the monitoring period for periodic monitoring coincides with the time specified in 40 CFR 63.168(f)(3).

(iii) If a leak is detected by monitoring that is conducted pursuant to 40 CFR 63.168(f)(3), the Permittee shall follow the provisions of 40 CFR 63.168(f)(3)(iii)(A) and 63.168(f)(3)(iii)(B), to determine whether that valve must be counted as a leaking valve for purposes of 40 CFR 63.168(e).

(A) If the Permittee elected to use periodic monitoring required by 40 CFR 63.168(b) through 63.168(d) to satisfy the requirements of 40 CFR 63.168(f)(3), then the valve shall be counted as a leaking valve.

(B) If the Permittee elected to use other monitoring, prior to the periodic monitoring required by 40 CFR 63.168(b) through 63.168(d), to satisfy the requirements of 40 CFR 63.168(f)(3), then the valve shall be counted as a leaking valve unless it is repaired and shown by periodic monitoring not to be leaking.

(g) Pursuant to 40 CFR 63.168(g), first attempts at repair include, but are not limited to, the following practices where practicable:

(1) Tightening of bonnet bolts,

(2) Replacement of bonnet bolts,

(3) Tightening of packing gland nuts, and

(4) Injection of lubricant into lubricated packing.

(h) Pursuant to 40 CFR 63.168(h), any valve that is designated, as described in 40 CFR 63.181(b)(7)(i), as an unsafe-to-monitor valve is exempt from the requirements of 40 CFR 63.168(b) through 63.168(d) if:

(1) The Permittee of the valve determines that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.168(b) through 63.168(f); and

(2) The Permittee of the valve has a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable.

(i) Pursuant to 40 CFR 63.168(i), any valve that is designated, as described in 40 CFR 63.181(b)(7)(ii), as a difficult-to-monitor valve is exempt from the requirements of 40 CFR 63.168(b) through 63.168(d) if:

(1) The Permittee of the valve determines that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface or it is not accessible at anytime in a safe manner;

(2) The process unit within which the valve is located is an existing source or the Permittee designates less than 3 percent of the total number of valves in a new source as difficult-to-monitor; and

(3) The Permittee of the valve follows a written plan that requires monitoring of the valve at least once per calendar year.

(j) Pursuant to 40 CFR 63.168(j), any equipment located at a plant site with fewer than 250 valves in organic HAP service is exempt from the requirements for monthly monitoring and a quality improvement program specified in 40 CFR 63.168(d)(1). Instead, the Permittee shall monitor each valve in organic HAP service for leaks once each quarter, or comply with 40 CFR 63.168(d)(3) or 63.168(d)(4) except as provided in 40 CFR 63.168(h) and 63.168(i).

CC.8 Standards: Pumps, Valves, Connectors, and Agitators in Heavy Liquid Service; Instrumentation systems; and Pressure Relief Devices in Liquid Service [326 IAC 14][40 CFR 63.169, Subpart H]

(a) Pursuant to 40 CFR 63.169(a), pumps, valves, connectors, and agitators in heavy liquid service, pressure relief devices in light liquid or heavy liquid service, and instrumentation systems shall be monitored within 5 calendar days by the method specified in 40 CFR 63.180(b) if evidence of a potential leak to the atmosphere is found by visual, audible, olfactory, or any other detection method. If such a potential leak is repaired as required in 40 CFR 63.169(c) and 63.169(d), it is not necessary to monitor the system for leaks by the method specified in 40 CFR 63.180(b).

(b) Pursuant to 40 CFR 63.169(b), if an instrument reading of 10,000 parts per million or greater for agitators, 5,000 parts per million or greater for pumps handling polymerizing monomers, 2,000 parts per million or greater for all other pumps (including pumps in food/medical service), or 500 parts per million or greater for valves, connectors, instrumentation systems, and pressure relief devices is measured, a leak is detected.

(c) (1) Pursuant to 40 CFR 63.169(c), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.171.

(2) The first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(3) For equipment identified in 40 CFR 63.169(a) of that is not monitored by the method specified in 40 CFR 63.180(b), repaired shall mean that the visual, audible, olfactory, or other indications of a leak to the atmosphere have been eliminated; that no bubbles are observed at potential leak sites during a leak check using soap solution; or that the system will hold a test pressure.

(d) Pursuant to 40 CFR 63.169(d), first attempts at repair include, but are not limited to, the practices described under 40 CFR 63.163(c)(2) and 63.168(g), for pumps and valves, respectively.

CC.9 Standards: Surge Control Vessels and Bottoms Receivers [326 IAC 14][40 CFR 63.170, Subpart H]

Pursuant to 40 CFR 63.170 (Standards: Surge Control Vessels and Bottoms Receivers), the Permittee shall equip each surge control vessel or bottoms receiver that is not routed back to the process and that meets the conditions specified in Table 2 or Table 3 of 40 CFR 63, Subpart H with a closed-vent system that routes the organic vapors vented from the surge control vessel or bottoms receiver back to the process or to a control device that complies with the requirements in 40 CFR 63.172, except as provided in 40 CFR 63.162(b), or comply with the requirements of 40 CFR 63.119(b) or 63.119(c) of Subpart G.

CC.10 Standards: Delay of Repair [326 IAC 14][40 CFR 63.171, Subpart H]

(a) Pursuant to 40 CFR 63.171(a), delay of repair of equipment for which leaks have been detected is allowed if repair within 15 days is technically infeasible without a process unit shutdown. Repair of this equipment shall occur by the end of the next process unit shutdown.

b) Pursuant to 40 CFR 63.171(b), delay of repair of equipment for which leaks have been detected is allowed for equipment that is isolated from the process and that does not remain in organic HAP service.

(c) Pursuant to 40 CFR 63.171(c), delay of repair for valves, connectors, and agitators is also allowed if:

(1) The Permittee determines that emissions of purged material resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair, and

(2) When repair procedures are effected, the purged material is collected and destroyed or recovered in a control device complying with 40 CFR 63.172.

(d) Pursuant to 40 CFR 63.171(d), delay of repair for pumps is also allowed if:

(1) Repair requires replacing the existing seal design with a new system that the Permittee has determined under the provisions of 40 CFR 63.176(d) will provide better performance or:

(i) A dual mechanical seal system that meets the requirements of 40 CFR 63.163(e),

(ii) A pump that meets the requirements of 40 CFR 63.163(f), or

(iii) A closed-vent system and control device that meets the requirements of 40 CFR 63.163(g); and

(2) Repair is completed as soon as practicable, but not later than 6 months after the leak was detected.

(e) Pursuant to 40 CFR 63.171(e), delay of repair beyond a process unit shutdown will be allowed for a valve if valve assembly replacement is necessary during the process unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the second process unit shutdown will not be allowed unless the third process unit shutdown occurs sooner than 6 months after the first process unit shutdown.

CC.11 Standards: Closed-Vent Systems and Control Devices [326 IAC 14][40 CFR 63.172, Subpart H]

(a) Pursuant to 40 CFR 63.172(a), the permittee of a closed-vent systems and control devices used to comply with provisions of 40 CFR 63 Subpart H shall comply with the provisions of 40 CFR 63.172, except as provided in 40 CFR 63.162(b).

(b) Pursuant to 40 CFR 63.172(b), recovery or recapture devices (e.g., condensers and absorbers) shall be designed and operated to recover the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with an efficiency of 95 percent or greater, or to an exit concentration of 20 parts par million by volume, whichever is less stringent. The 20 parts per million by volume performance standard is not applicable to the provisions of 40 CFR 63.179.

(c) Pursuant to 40 CFR 63.172(c), enclosed combustion devices shall be designed and operated to reduce the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with an efficiency of 95 percent or greater, or to an exit concentration of 20 parts per million by volume, on a dry basis, corrected to 3 percent oxygen, whichever is less stringent, or to provide a minimum residence time of 0.50 seconds at a minimum temperature of 760℃.

(d) [Reserved]

(e) Pursuant to 40 CFR 63.172(e), permittee control devices that are used to comply with the provisions of 40 CFR 63, Subpart H shall monitor these control devices to ensure that they are operated and maintained in conformance with their design.

Note:
The intent of this provision is to ensure proper operation and maintenance of the control device.

(f) Pursuant to 40 CFR 63.172(f), except as provided in 40 CFR 63.172(k) and 63.172(l), each closed-vent system shall be inspected according to the procedures and schedule specified in 40 CFR 63.172(f)(1) and 63.172(f)(2).

(1) If the closed-vent system is constructed of hard-piping, the Permittee shall:

(i) Conduct an initial inspection according to the procedures in 40 CFR 63.172(g), and

(ii) Conduct annual visual inspections for visible, audible, or olfactory indications of leaks.

(2) If the vapor collection system or closed-vent system is constructed of duct work, the Permittee shall:

(i) Conduct an initial inspection according to the procedures in 40 CFR 63.172(g), and

(ii) Conduct annual inspections according to the procedures in 40 CFR 63.172(g).

(g) Pursuant to 40 CFR 63.172(g), each closed-vent system shall be inspected according to the procedures in 40 CFR 63.180(b).

(h) Pursuant to 40 CFR 63.172(h), leaks, as indicated by an instrument reading greater than 500 parts per million above background or by visual inspections, shall be repaired as soon as practicable, except as provided in 40 CFR 63.172(i).

(1) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected.

(2) Repair shall be completed no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.172(i).

(i) Pursuant to 40 CFR 63.172(i), delay of repair of a closed-vent system for which leaks have been detected is allowed if the repair is technically infeasible without a process unit shutdown or if the Permittee determines that emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair. Repair of such equipment shall be complete by the end of the next process unit shutdown.

(j) Pursuant to 40 CFR 63.172(j), for each closed-vent system that contains bypass lines that could divert a vent stream away from the control device and to the atmosphere, the Permittee shall comply with the provisions of either 40 CFR 63.172(j)(1) or 63.172(j)(2), except as provided in 40 CFR 63.172(j)(3).

(1) Install, set or adjust, maintain, and operate a flow indicator that takes a reading at least once every 15 minutes. Records shall be generated as specified in 40 CFR 63.118(a)(3) [BB.11(a)(3)]. The flow indicator shall be installed at the entrance to any bypass line; or

(2) Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. A visual inspection of the seal or closure mechanism shall be performed at least once every month to ensure the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line.

(3) Equipment such as low leg drains, high point bleeds, analyzer vents, open-ended valves or lines, and pressure relief valves needed for safety purposes are not subject to 40 CFR 63.172(j).

(k) Pursuant to 40 CFR 63.172(k), any parts of the closed-vent system that are designated, as described in 40 CFR 63.181(b)(7)(i), as unsafe to inspect are exempt from the inspection requirements of 40 CFR 63.172(f)(1) and 63.172(f)(2) if:

(1) The Permittee determines that the equipment is unsafe to inspect because inspecting personnel would be exposed to an imminent or potential danger as a consequence of complying with 40 CFR 63.172(f)(1) or 63.172(f)(2); and

(2) The Permittee has a written plan that requires inspection of the equipment as frequently as practicable during safe-to-inspect times, but not more frequently than annually.

(l) Pursuant to 40 CFR 63.172(l), any parts of the closed-vent system that are designated, as described in 40 CFR 63.181(b)(7)(i), as difficult to inspect are exempt from the inspection requirements of 40 CFR 63.172(f)(1) and 63.172(f)(2) if:

(1) The Permittee determines that the equipment cannot be inspected without elevating the inspecting personnel more than 2 meters above a support surface; and

(2) The Permittee has a written plan that requires inspection of the equipment at least once every 5 years.

(m) Pursuant to 40 CFR 63.172(m), whenever organic HAP emissions are vented to a closed-vent system or control device used to comply with the provisions of 40 CFR 63, Subpart H, such system or control device shall be operating.

(n) Pursuant to 40 CFR 63.172(n), after the compliance dates specified in 40 CFR 63.100, of Subpart F, the Permittee of any control device subject to 40 CFR 63, Subpart H that is also subject to monitoring, recordkeeping, and reporting requirements in 40 CFR part 264, Subpart BB, or is subject to monitoring and recordkeeping requirements in 40 CFR

part 265, Subpart BB, may elect to comply either with the monitoring, recordkeeping, and reporting requirements of 40 CFR 63, Subpart H, or with the monitoring, recordkeeping, and reporting requirements in 40 CFR parts 264 and/or 265, as described in 40 CFR 63.172(n), which shall constitute compliance with the monitoring, recordkeeping and reporting requirements of 40 CFR 63, Subpart H. The Permittee shall identify which option has been chosen, in the next periodic report required by 40 CFR 63.182(d).

CC.12 Standards: Agitators in Gas/Vapor Service and in Light Liquid Service
[326 IAC 14] [40 CFR 63.173, Subpart H]

(a) (1) Pursuant to 40 CFR 63.173(a), each agitator shall be monitored monthly to detect leaks by the methods specified in 40 CFR 63.180(b), except as provided in 40 CFR 63.162(b).

(2) If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected.

(b) (1) Pursuant to 40 CFR 63.173(b), each agitator shall be checked by visual inspection each calendar week for indications of liquids dripping from the agitator.

(2) If there are indications of liquids dripping from the agitator, a leak is detected.

(c) (1) Pursuant to 40 CFR 63.173(c), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.171.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(d) Pursuant to 40 CFR 63.173(d), each agitator equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of 40 CFR 63.173(a), provided the requirements specified in 40 CFR 63.173(d)(1) through 63.173(d)(6) are met:

(1) Each dual mechanical seal system is:

(i) Operated with the barrier fluid at a pressure that is at all times greater than the agitator stuffing box pressure; or

(ii) Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or

(iii) Equipped with a closed-loop system that purges the barrier fluid into a process stream.

(2) The barrier fluid is not in light liquid organic HAP service.

(3) Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(4) Each agitator is checked by visual inspection each calendar week for indications of liquids dripping from the agitator seal.

(i) If there are indications of liquids dripping from the agitator seal at the time of the weekly inspection, the agitator shall be monitored as specified in 40 CFR 63.180(b) to determine the presence of organic HAP in the barrier fluid.

(ii) If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected.

(5) Each sensor as described in 40 CFR 63.173(d)(3) is observed daily or is equipped with an alarm unless the agitator is located within the boundary of an unmanned plant site.

(6) (i) The Permittee determines, based on design considerations and operating experience, criteria applicable to the presence and frequency of drips and to the sensor that indicates failure of the seal system, the barrier fluid system, or both.

(ii) If indications of liquids dripping from the agitator seal exceed the criteria established in 40 CFR 63.173(d)(6)(i) or if, based on the criteria established in 40 CFR 63.173(d)(6)(i) and the sensor indicates failure of the seal system, the barrier fluid system, or both, a leak is detected.

(iii) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 63.171.

(iv) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(e) Pursuant to 40 CFR 63.173(e), any agitator that is designed with no externally actuated shaft penetrating the agitator housing is exempt from 40 CFR 63.173(a) through 63.173(c).

(f) Pursuant to 40 CFR 63.173(f), any agitator equipped with a closed-vent system capable of capturing and transporting any leakage from the seal or seals to a process or fuel gas system or to a control device that complies with the requirements of 40 CFR 63.172 is exempt from the requirements of 40 CFR 63.173(a) through 63.173(c).

(g) Pursuant to 40 CFR 63.173(g), any agitator that is located within the boundary of an unmanned plant site is exempt from the weekly visual inspection requirement of 40 CFR 63.173(b)(1) and 63.173(d)(4), and the daily requirements of 40 CFR 63.173(d)(5), provided that each agitator is visually inspected as often as practical and at least monthly.

(h) Pursuant to 40 CFR 63.173(h), any agitator that is difficult-to-monitor is exempt from the requirements of 40 CFR 63.173(a) through 63.173(d) if:

(1) The Permittee determines that the agitator cannot be monitored without elevating the monitoring personnel more than two meters above a support surface or it is not accessible at anytime in a safe manner;

(2) The process unit within which the agitator is located is an existing source or the Permittee designates less than three percent of the total number of agitators in a new source as difficult-to-monitor; and

(3) The Permittee follows a written plan that requires monitoring of the agitator at least once per calendar year.

(i) Pursuant to 40 CFR 63.173(i), any agitator that is obstructed by equipment or piping that prevents access to the agitator by a monitor probe is exempt from the monitoring requirements of 40 CFR 63.173(a) through 63.173(d).

(j) Pursuant to 40 CFR 63.173(j), any agitator that is designated, as described in 40 CFR 63.181(b)(7)(i), as an unsafe-to-monitor agitator is exempt from the requirements of 40 CFR 63.173(a) through 63.173(d) if:

(1) The Permittee of the agitator determines that the agitator is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.173(a) through 63.173(d); and

(2) The Permittee of the agitator has a written plan that requires monitoring of the agitator as frequently as practical during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable.

CC.13 Standards: Connectors in Gas/Vapor Service and in Light Liquid Service [326 IAC 14] [40 CFR 63.174, Subpart H]

(a) Pursuant to 40 CFR 63.174(a), the Permittee of a process unit subject to 40 CFR 63, Subpart H shall monitor all connectors in gas/vapor and light liquid service, except as provided in 40 CFR 63.162(b), and 63.174(f) through 63.174(h), at the intervals specified in 40 CFR 63.174(b).

(1) The connectors shall be monitored to detect leaks by the method specified in 40 CFR 63.180(b).

(2) If an instrument reading greater than or equal to 500 parts per million is measured, a leak is detected.

(b) Pursuant to 40 CFR 63.174(b), the Permittee shall monitor for leaks at the intervals specified in either 40 CFR 63.174(b)(1) or 63.174(b)(2) and in 40 CFR 63.174(b)(3).

(1) For each group of existing process units within an existing source, by no later than 12 months after the compliance date, the Permittee shall monitor all connectors, except as provided in 40 CFR 63.174(f) through 63.174(h).

(2) For new sources, within the first 12 months after initial start-up or by no later than 12 months after the date of promulgation of a specific Subpart that references 40 CFR 63 Subpart H, whichever is later, the Permittee shall monitor all connectors, except as provided in 40 CFR 63.174(f) through 63.174(h).

(3) After conducting the initial survey required in 40 CFR 63.174(b)(1) or 63.174(b)(2), the Permittee shall perform all subsequent monitoring of connectors at the frequencies specified in 40 CFR 63.174(b)(3)(i) through 63.174(b)(3)(v), except as provided in 40 CFR 63.174(c)(2):

(i) Once per year (i.e., 12-month period), if the percent leaking connectors in the process unit was 0.5 percent or greater during the last required annual or biennial monitoring period.

(ii) Once every 2 years, if the percent leaking connectors was less than 0.5 percent during the last required monitoring period. A Permittee may comply with 40 CFR 63.174(b)(3)(ii) by monitoring at least 40 percent of the connectors in the first year and the remainder of the connectors in the second year. The percent leaking connectors will be calculated for the total of all monitoring performed during the 2-year period.

(iii) If the Permittee of a process unit in a biennial leak detection and repair program calculates less than 0.5 percent leaking connectors from the 2-year monitoring period, the Permittee may monitor the connectors one time every 4 years. A Permittee may comply with the requirements of 40

CFR 63.174(b)(3)(iii) by monitoring at least 20 percent of the connectors each year until all connectors have been monitored within 4 years.

(iv) If a process unit complying with the requirements of 40 CFR 63.174(b) using a 4-year monitoring interval program has greater than or equal to 0.5 percent but less than 1 percent leaking connectors, the Permittee shall increase the monitoring frequency to one time every 2 years. A Permittee may comply with the requirements of 40 CFR 63.174(b)(3)(iv) by monitoring at least 40 percent of the connectors in the first year and the remainder of the connectors in the second year. The Permittee may again elect to use the provisions of 40 CFR 63.174(b)(3)(iii) when the percent leaking connectors decreases to less than 0.5 percent.

(v) If a process unit complying with requirements of 40 CFR 63.174(b)(3)(iii) using a 4-year monitoring interval program has 1 percent or greater leaking connectors, the Permittee shall increase the monitoring frequency to one time per year. The Permittee may again elect to use the provisions of 40 CFR 63.174(b)(3)(iii) when the percent leaking connectors decreases to less than 0.5 percent.

(4) The use of monitoring data generated before April 22, 1994 to qualify for less frequent monitoring is governed by the provisions of 40 CFR 63.180(b)(6).

(c) (1) (i) Pursuant to 40 CFR 63.174(c), except as provided in 40 CFR 63.174(c)(1)(ii), each connector that has been opened or has otherwise had the seal broken shall be monitored for leaks when it is reconnected or within the first 3 months after being returned to organic hazardous air pollutants service. If the monitoring detects a leak, it shall be repaired according to the provisions of 40 CFR 63.174(d), unless it is determined to be nonrepairable, in which case it is counted as a nonrepairable connector for the purposes of 40 CFR 63.174(i)(2).

(ii) As an alternative to the requirements in 40 CFR 63.174(c)(1)(i), the Permittee may choose not to monitor connectors that have been opened or otherwise had the seal broken. In this case, the Permittee may not count nonrepairable connectors for the purposes of 40 CFR 63.174(i)(2). The Permittee shall calculate the percent leaking connectors for the monitoring periods described in 40 CFR 63.174(b), by setting the nonrepairable component, CAN, in the equation in 40 CFR 63.174(i)(2) to zero for all monitoring periods.

(iii) The Permittee may switch alternatives described in 40 CFR 63.174(c)(1)(i), and 63.174(c)(1)(ii), at the end of the current monitoring period he is in, provided that it is reported as required in 40 CFR 63.182 and begin the new alternative in annual monitoring. The initial monitoring in the new alternative shall be completed no later than 12 months after reporting the switch.

(2) As an alternative to the requirements of 40 CFR 63.174(b)(3), each screwed connector 2 inches or less in nominal inside diameter installed in a process unit before the dates specified in 40 CFR 63.174(c)(2)(iii) or 63.174(c)(2)(iv) may:

(i) Comply with the requirements of 40 CFR 63.169, and

(ii) Be monitored for leaks within the first 3 months after being returned to organic hazardous air pollutants service after having been opened or otherwise had the seal broken. If that monitoring detects a leak, it shall be repaired according to the provisions of 40 CFR 63.174(d).

(iii) For sources subject to 40 CFR 63, Subparts F and I, the provisions of 40 CFR 63.174(c)(2) apply to screwed connectors installed before December 31, 1992.

(iv) For sources not identified in 40 CFR 63.174(c)(2)(iii), the provisions of 40 CFR 63.174(c)(2) apply to screwed connectors installed before the date of proposal of the applicable 40 CFR 63 Subpart that references Subpart H.

(d) Pursuant to 40 CFR 63.174(d), when a leak is detected, it shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.174(g) and 63.171. A first attempt at repair shall be made no later than 5 calendar days after the leak is detected.

(e) [Reserved]

(f) Pursuant to 40 CFR 63.174(f), any connector that is designated, as described in 40 CFR 63.181(b)(7)(i), as an unsafe-to-monitor connector is exempt from the requirements of 40 CFR 63.174(a) if:

(1) The Permittee determines that the connector is unsafe to monitor because personnel would be exposed to an immediate danger as a result of complying with 40 CFR 63.174(a) through 63.174(e); and

(2) The Permittee has a written plan that requires monitoring of the connector as frequently as practicable during safe to monitor periods, but not more frequently than the periodic schedule otherwise applicable.

(g) Pursuant to 40 CFR 63.174(g), any connector that is designated, as described in 40 CFR 63.181(b)(7)(iii), as an unsafe-to-repair connector is exempt from the requirements of 40 CFR 63.174(a), 63.174(d), and 63.174(e) if:

(1) The Permittee determines that repair personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.174(d); and

(2) The connector will be repaired before the end of the next scheduled process unit shutdown.

(h) (1) Pursuant to 40 CFR 63.174(h)(1), any connector that is inaccessible or is ceramic or ceramic-lined (e.g., porcelain, glass, or glass-lined), is exempt from the monitoring requirements of 40 CFR 63.174(a) and 63.174(c) and from the recordkeeping and reporting requirements of 40 CFR 63.181 and 63.182. An inaccessible connector is one that is:

(i) Buried;

(ii) Insulated in a manner that prevents access to the connector by a monitor probe;

(iii) Obstructed by equipment or piping that prevents access to the connector by a monitor probe;

(iv) Unable to be reached from a wheeled scissor-lift or hydraulic-type scaffold which would allow access to connectors up to 7.6 meters (25 feet) above the ground;

(v) Inaccessible because it would require elevating the monitoring personnel more than 2 meters above a permanent support surface or would require the erection of scaffold; or

(vi) Not able to be accessed at any time in a safe manner to perform monitoring. Unsafe access includes, but is not limited to, the use of a wheeled scissor-lift on unstable or uneven terrain, the use of a motorized man-lift basket in areas where an ignition potential exists, or access would require near proximity to hazards such as electrical lines, or would risk damage to equipment.

(2) If any inaccessible or ceramic or ceramic-lined connector is observed by visual, audible, olfactory, or other means to be leaking, the leak shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171 and 63.174(g).

(3) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected.

(i) Pursuant to 40 CFR 63.174(i), for use in determining the monitoring frequency, as specified in 40 CFR 63.174(b), the percent leaking connectors shall be calculated as specified in 40 CFR 63.174(i)(1) and 63.174(i)(2).

(1) For the first monitoring period, use the following equation:

$$\% C_L = C_L/(C_t + C_C) \times 100$$

where:

% CL = Percent leaking connectors as determined through periodic monitoring required in 40 CFR 63.174(a) and 63.174(b).

CL = Number of connectors measured at 500 parts per million or greater, by the method specified in 40 CFR 63.180(b).

Ct = Total number of monitored connectors in the process unit.

CC = Optional credit for removed connectors = 0.67 × net (i.e., total removed—total added) number of connectors in organic hazardous air pollutants service removed from the process unit after the compliance date set forth in the applicable Subpart for existing process units, and after the date of initial start-up for new process units. If credits are not taken, then CC= 0.

(2) For subsequent monitoring periods, use the following equation:

$$\% C_L = [(C_L - C_{AN})/(C_t + C_C)] \times 100$$

where:

% CL = Percent leaking connectors as determined through periodic monitoring required in 40 CFR 63.174(a) and 63.174(b).

CL = Number of connectors, including nonrepairables, measured at 500 parts per million or greater, by the method specified in 40 CFR 63.180(b).

CAN = Number of allowable nonrepairable connectors, as determined by monitoring required in 40 CFR 63.174(b)(3) and 63.174(c) not to exceed 2 percent of the total connector population, Ct.

Ct = Total number of monitored connectors, including nonrepairables, in the process unit.

CC = Optional credit for removed connectors = 0.67 × net number (i.e., total removed—total added) of connectors in organic hazardous air pollutants service removed from the process unit after the compliance date set forth in the applicable Subpart for existing process units, and after the date of initial start-up for new process units. If credits are not taken, then CC= 0.

(j) Pursuant to 40 CFR 63.174(j), optional credit for removed connectors. If the Permittee eliminates a connector subject to monitoring under 40 CFR 63.174(b), the Permittee may receive credit for elimination of the connector, as described in 40 CFR 63.174(i), provided the requirements in 40 CFR 63.174(j)(1) through 63.174(j)(4) are met.

(1) The connector was welded after the date of proposal of the specific Subpart that references 40 CFR 63, Subpart H.

(2) The integrity of the weld is demonstrated by monitoring it according to the procedures in 40 CFR 63.180(b) or by testing using X-ray, acoustic monitoring, hydrotesting, or other applicable method.

(3) Welds created after the date of proposal but before the date of promulgation of a specific Subpart that references 40 CFR 63, Subpart H are monitored or tested by 3 months after the compliance date specified in the applicable Subpart.

(4) Welds created after promulgation of the Subpart that references 40 CFR 63, Subpart H are monitored or tested within 3 months after being welded.

(5) If an inadequate weld is found or the connector is not welded completely around the circumference, the connector is not considered a welded connector and is therefore not exempt from the provisions of 40 CFR 63, Subpart H.

CC.14 Quality Improvement: Program For Pumps [326 IAC 14][40 CFR 63.176, Subpart H]

(a) Pursuant to 40 CFR 63.176(a), in Phase III, if, on a 6-month rolling average, the greater of either 10 percent of the pumps in a process unit (or plant site) or three pumps in a process unit (or plant site) leak, the Permittee shall comply with the requirements of 40 CFR 63.176 as specified below:

(1) Pumps that are in food/medical service or in polymerizing monomer service shall comply with all requirements except for those specified in 40 CFR 63.176(d)(8).

(2) Pumps that are not in food/medical or polymerizing monomer service shall comply with all requirements of 40 CFR 63.176.

(b) Pursuant to 40 CFR 63.176(b), the Permittee shall comply with the requirements of 40 CFR 63.176 until the number of leaking pumps is less than the greater of either 10 percent of the pumps or three pumps, calculated as a 6-month rolling average, in the process unit (or plant site). Once the performance level is achieved, the Permittee shall comply with the requirements in 40 CFR 63.163.

(c) Pursuant to 40 CFR 63.176(c), if in a subsequent monitoring period, the process unit (or plant site) has greater than 10 percent of the pumps leaking or three pumps leaking (calculated as a 6-month rolling average), the Permittee shall resume the quality improvement program starting at performance trials.

(d) Pursuant to 40 CFR 63.176(d), the quality improvement program shall include the following:

(1) The Permittee shall comply with the requirements in 40 CFR 63.163.

(2) The Permittee shall collect the following data, and maintain records as required in 40 CFR 63.181(h)(3), for each pump in each process unit (or plant site) subject to the quality improvement program. The data may be collected and the records may be maintained on a process unit or plant site basis.

(i) Pump type (e.g., piston, horizontal or vertical centrifugal, gear, bellows); pump manufacturer; seal type and manufacturer; pump design (e.g., external shaft, flanged body); materials of construction; if applicable, barrier fluid or packing material; and year installed.

(ii) Service characteristics of the stream such as discharge pressure, temperature, flow rate, corrosivity, and annual operating hours.

(iii) The maximum instrument readings observed in each monitoring observation before repair, response factor for the stream if appropriate, instrument model number, and date of the observation.

(iv) If a leak is detected, the repair methods used and the instrument readings after repair.

(v) If the data will be analyzed as part of a larger analysis program involving data from other plants or other types of process units, a description of any maintenance or quality assurance programs used in the process unit that are intended to improve emission performance.

(3) The Permittee shall continue to collect data on the pumps as long as the process unit (or plant site) remains in the quality improvement program.

(4) The Permittee shall inspect all pumps or pump seals which exhibited frequent seal failures and were removed from the process unit due to leaks. The inspection shall determine the probable cause of the pump seal failure or of the pump leak and shall include recommendations, as appropriate, for design changes or changes in specifications to reduce leak potential.

(5) (i) The Permittee shall analyze the data collected to comply with the requirements of 40 CFR 63.176(d)(2) to determine the services, operating or maintenance practices, and pump or pump seal designs or technologies that have poorer than average emission performance and those that have better than average emission performance. The analysis shall determine if specific trouble areas can be identified on the basis of service, operating conditions or maintenance practices, equipment design, or other process specific factors.

(ii) The analysis shall also be used to determine if there are superior performing pump or pump seal technologies that are applicable to the service(s), operating conditions, or pump or pump seal designs associated with poorer than average emission performance. A superior performing pump or pump seal technology is one with a leak frequency of less than 10 percent for specific applications in the process unit or plant site. A candidate superior performing pump or pump seal technology is one demonstrated or reported in the available literature or through a group study as having low emission performance and as being

capable of achieving less than 10 percent leaking pumps in the process unit (or plant site).

(iii) The analysis shall include consideration of:

(A) The data obtained from the inspections of pumps and pump seals removed from the process unit due to leaks;

(B) Information from the available literature and from the experience of other plant sites that will identify pump designs or technologies and operating conditions associated with low emission performance for specific services; and

(C) Information on limitations on the service conditions for the pump seal technology operating conditions as well as information on maintenance procedures to ensure continued low emission performance.

(iv) The data analysis may be conducted through an inter- or intra-company program (or through some combination of the two approaches) and may be for a single process unit, a plant site, a company, or a group of process units.

(v) The first analysis of the data shall be completed no later than 18 months after the start of the quality improvement program. The first analysis shall be performed using a minimum of 6 months of data. An analysis of the data shall be done each year the process unit is in the quality improvement program.

(6) A trial evaluation program shall be conducted at each plant site for which the data analysis does not identify use of superior performing pump seal technology or pumps that can be applied to the areas identified as having poorer than average performance, except as provided in 40 CFR 63.176 (d)(6)(v). The trial program shall be used to evaluate the feasibility of using in the process unit (or plant site) the pump designs or seal technologies, and operating and maintenance practices that have been identified by others as having low emission performance.

(i) The trial program shall include on-line trials of pump seal technologies or pump designs and operating and maintenance practices that have been identified in the available literature or in analysis by others as having the ability to perform with leak rates below 10 percent in similar services, as having low probability of failure, or as having no external actuating mechanism in contact with the process fluid. If any of the candidate superior performing pump seal technologies or pumps is not included in the performance trials, the reasons for rejecting specific technologies from consideration shall be documented as required in 40 CFR 63.181(h)(5)(ii).

(ii) The number of pump seal technologies or pumps in the trial evaluation program shall be the lesser of 1 percent or two pumps for programs involving single process units and the lesser of 1 percent or five pumps for programs involving a plant site or groups of process units. The minimum number of pumps or pump seal technologies in a trial program shall be one.

(iii) The trial evaluation program shall specify and include documentation of:

(A) The candidate superior performing pump seal designs or technologies to be evaluated, the stages for evaluating the identified candidate pump designs or pump seal technologies, including the time period necessary to test the applicability;

(B) The frequency of monitoring or inspection of the equipment;

(C) The range of operating conditions over which the component will be evaluated; and

(D) Conclusions regarding the emission performance and the appropriate operating conditions and services for the trial pump seal technologies or pumps.

(iv) The performance trials shall initially be conducted, at least, for a 6-month period beginning not later than 18 months after the start of the quality improvement program. No later than 24 months after the start of the quality improvement program, the Permittee shall have identified pump seal technologies or pump designs that, combined with appropriate process, operating, and maintenance practices, operate with low emission performance for specific applications in the process unit. The Permittee shall continue to conduct performance trials as long as no superior performing design or technology has been identified, except as provided in 40 CFR 63.176(d)(6)(vi). The initial list of superior emission performance pump designs or pump seal technologies shall be amended in the future, as appropriate, as additional information and experience is obtained.

(v) Any plant site with fewer than 400 valves and owned by a corporation with fewer than 100 employees shall be exempt from trial evaluations of pump seals or pump designs. Plant sites exempt from the trial evaluations of pumps shall begin the pump seal or pump replacement program at the start of the fourth year of the quality improvement program.

(vi) A Permittee who has conducted performance trials on all alternative superior emission performance technologies suitable for the required applications in the process unit may stop conducting performance trials provided that a superior performing design or technology has been demonstrated or there are no technically feasible alternative superior technologies remaining. The Permittee shall prepare an engineering evaluation documenting the physical, chemical, or engineering basis for the judgment that the superior emission performance technology is technically infeasible or demonstrating that it would not reduce emissions.

(7) Each Permittee shall prepare and implement a pump quality assurance program that details purchasing specifications and maintenance procedures for all pumps and pump seals in the process unit. The quality assurance program may establish any number of categories, or classes, of pumps as needed to distinguish among operating conditions and services associated with poorer than average emission performance as well as those associated with better than average emission performance. The quality assurance program shall be developed considering the findings of the data analysis required under 40 CFR 63.176(d)(5), if applicable, the findings of the trial evaluation required in 40 CFR 63.176(d)(6), and the operating conditions in the process unit. The quality assurance program shall be updated each year as long as the process unit has

the greater of either 10 percent or more leaking pumps or has three leaking pumps.

(i) The quality assurance program shall:

(A) Establish minimum design standards for each category of pumps or pump seal technology. The design standards shall specify known critical parameters such as tolerance, manufacturer, materials of construction, previous usage, or other applicable identified critical parameters;

(B) Require that all equipment orders specify the design standard (or minimum tolerances) for the pump or the pump seal;

(C) Provide for an audit procedure for quality control of purchased equipment to ensure conformance with purchase specifications. The audit program may be conducted by the Permittee of the plant site or process unit or by a designated representative; and

(D) Detail off-line pump maintenance and repair procedures. These procedures shall include provisions to ensure that rebuilt or refurbished pumps and pump seals will meet the design specifications for the pump category and will operate such that emissions are minimized.

(ii) The quality assurance program shall be established no later than the start of the third year of the quality improvement program for plant sites with 400 or more valves or 100 or more employees; and no later than the start of the fourth year of the quality improvement program for plant sites with less than 400 valves and less than 100 employees.

(8) Beginning at the start of the third year of the quality improvement program for plant sites with 400 or more valves or 100 or more employees and at the start of the fourth year of the quality improvement program for plant sites with less than 400 valves and less than 100 employees, the Permittee shall replace, as described in 40 CFR 63.176(d)(8)(i) and 63.176(d)(8)(ii), the pumps or pump seals that are not superior emission performance technology with pumps or pump seals that have been identified as superior emission performance technology and that comply with the quality assurance standards for the pump category. Superior emission performance technology is that category or design of pumps or pump seals with emission performance which, when combined with appropriate process, operating, and maintenance practices, will result in less than 10 percent leaking pumps for specific applications in the process unit or plant site. Superior emission performance technology includes material or design changes to the existing pump, pump seal, seal support system, installation of multiple mechanical seals or equivalent, or pump replacement.

(i) Pumps or pump seals shall be replaced at the rate of 20 percent per year based on the total number of pumps in light liquid service. The calculated value shall be rounded to the nearest nonzero integer value. The minimum number of pumps or pump seals shall be one. Pump replacement shall continue until all pumps subject to the requirements of 40 CFR 63.163 are pumps determined to be superior performance technology.

(ii) The Permittee may delay replacement of pump seals or pumps with superior technology until the next planned process unit shutdown,

provided the number of pump seals and pumps replaced is equivalent to the 20 percent or greater annual replacement rate.

(iii) The pumps shall be maintained as specified in the quality assurance program.

CC.15 Alternative means of emission limitation: Enclosed-vented process units [326 IAC 14][40 CFR 63.179, Subpart H]

Pursuant to 40 CFR 63.179, process units enclosed in such a manner that all emissions from equipment leaks are vented through a closed-vent system to a control device meeting the requirements of 40 CFR 63.172 are exempt from the requirements of 40 CFR 63.163, through 63.171, and 40 CFR 63.173 and 63.174. The enclosure shall be maintained under a negative pressure at all times while the process unit is in operation to ensure that all emissions are routed to a control device.

Compliance Determination Requirements

CC.16 Test Methods and Procedures [326 IAC 14][40 CFR 63.180, Subpart H]

(a) Pursuant to 40 CFR 63.180(a), the Permittee subject to the provisions of 40 CFR Part 63, Subpart H shall comply with the test methods and procedures requirements provided in 40 CFR 63.180.

(b) Pursuant to 40 CFR 63.180(b), monitoring, as required under 40 CFR 63 Subpart H, shall comply with the following requirements:

(1) Monitoring shall comply with Method 21 of 40 CFR Part 60, Appendix A.

(2) (i) Except as provided for in 40 CFR 63.180(b)(2)(ii), the detection instrument shall meet the performance criteria of Method 21 of 40 CFR 60, Appendix A, except the instrument response factor criteria in Section 3.1.2(a) of Method 21 shall be for the average composition of the process fluid not each individual VOC in the stream. For process streams that contain nitrogen, water, air, or other inerts which are not organic HAP's or VOC's, the average stream response factor may be calculated on an inert-free basis. The response factor may be determined at any concentration for which monitoring for leaks will be conducted.

(ii) If no instrument is available at the plant site that will meet the performance criteria specified in 40 CFR 63.180(b)(2)(i), the instrument readings may be adjusted by multiplying by the average response factor of the process fluid, calculated on an inert-free basis as described in 40 CFR 63.180(b)(2)(i).

(3) The instrument shall be calibrated before use on each day of its use by the procedures specified in Method 21 of 40 CFR Part 60, Appendix A.

(4) Calibration gases shall be:

(i) Zero air (less than 10 parts per million of hydrocarbon in air); and

(ii) Mixtures of methane in air at the concentrations specified in 40 CFR 63.180(b)(4)(ii)(A) through 63.180(b)(4)(ii)(C). A calibration gas other than methane in air may be used if the instrument does not respond to methane or if the instrument does not meet the performance criteria specified in 40 CFR 63.180(b)(2)(i). In such cases, the calibration gas may be a mixture of one or more of the compounds to be measured in air.

(A) For Phase I, a mixture of methane or other compounds, as applicable, in air at a concentration of approximately, but less than, 10,000 parts per million.

(B) For Phase II, a mixture of methane or other compounds, as applicable, and air at a concentration of approximately, but less than, 10,000 parts per million for agitators, 5,000 parts per million for pumps, and 500 parts per million for all other equipment, except as provided in 40 CFR 63.180(b)(4)(iii).

(C) For Phase III, a mixture of methane or other compounds, as applicable, and air at a concentration of approximately, but less than, 10,000 parts per million methane for agitators; 2,000 parts per million for pumps in food/medical service; 5,000 parts per million for pumps in polymerizing monomer service; 1,000 parts per million for all other pumps; and 500 parts per million for all other equipment, except as provided in 40 CFR 63.180(b)(4)(iii).

(iii) The instrument may be calibrated at a higher methane concentration than the concentration specified for that piece of equipment. The concentration of the calibration gas may exceed the concentration specified as a leak by no more than 2,000 parts per million. If the monitoring instrument's design allows for multiple calibration scales, then the lower scale shall be calibrated with a calibration gas that is no higher than 2,000 parts per million above the concentration specified as a leak and the highest scale shall be calibrated with a calibration gas that is approximately equal to 10,000 parts per million. If only one scale on an instrument will be used during monitoring, the Permittee need not calibrate the scales that will not be used during that day's monitoring.

(5) Monitoring shall be performed when the equipment is in organic HAP service, in use with an acceptable surrogate volatile organic compound which is not an organic HAP, or is in use with any other detectable gas or vapor.

(6) Monitoring data that do not meet the criteria specified in 40 CFR 63.180(b)(1) through 63.180(b)(5) may be used to qualify for less frequent monitoring under the provisions in 40 CFR 63.168(d)(2) and 63.168(d)(3) or 63.174(b)(3)(ii) or 63.174(b)(3)(iii) provided the data meet the conditions specified in 40 CFR 63.180(b)(6)(i) and 63.180(b)(6)(ii).

(i) The data were obtained before April 22, 1994.

(ii) The departures from the criteria specified in 40 CFR 63.180(b)(1) through 63.180(b)(5) or from the specified monitoring frequency of 40 CFR 63.168(c) are minor and do not significantly affect the quality of the data. Examples of minor departures are monitoring at a slightly different frequency (such as every six weeks instead of monthly or quarterly), following the performance criteria of Section 3.1.2(a) of Method 21 of Appendix A of 40 CFR Part 60 instead of 40 CFR 63.180(b)(2), or monitoring at a different leak definition if the data would indicate the presence or absence of a leak at the concentration specified in 40 CFR Subpart H. Failure to use a calibrated instrument is not considered a minor departure.

(c) Pursuant to 40 CFR 63.180(c), when equipment is monitored for compliance as required in 40 CFR 63.164(i), 63.165(a), and 63.172(f) or when equipment subject to a leak definition of 500 ppm is monitored for leaks as required by 40 CFR 63, Subpart H, the Permittee may elect to adjust or not to adjust the instrument readings for background. If a

Permittee elects to not adjust instrument readings for background, the Permittee shall monitor the equipment according to the procedures specified in 40 CFR 63.180(b)(1) through 63.180(b)(4). In such case, all instrument readings shall be compared directly to the applicable leak definition to determine whether there is a leak. If the Permittee elects to adjust instrument readings for background, the Permittee shall monitor the equipment according to the procedures specified in 40 CFR 63.180(c)(1) through 63.180(c)(4).

(1) The requirements of 40 CFR 63.180(b)(1) through 63.180(b)(4) shall apply.

(2) The background level shall be determined, using the same procedures that will be used to determine whether the equipment is leaking.

(3) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Method 21 of 40 CFR 60, Appendix A.

(4) The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 parts per million for determining compliance.

(d) (1) Pursuant to 40 CFR 63.180(d)(1), each piece of equipment within a process unit that can reasonably be expected to contain equipment in organic HAP service is presumed to be in organic HAP service unless the Permittee demonstrates that the piece of equipment is not in organic HAP service. For a piece of equipment to be considered not in organic HAP service, it must be determined that the percent organic HAP content can be reasonably expected not to exceed 5 percent by weight on an annual average basis. For purposes of determining the percent organic HAP content of the process fluid that is contained in or contacts equipment, Method 18 of 40 CFR Part 60, Appendix A shall be used.

(2) (i) The Permittee may use good engineering judgment rather than the procedures in 40 CFR 63.180(d)(1) to determine that the percent organic HAP content does not exceed 5 percent by weight. When the Permittee and the IDEM, OAQ do not agree on whether a piece of equipment is not in organic HAP service, however, the procedures in 40 CFR 63.180(d)(1) shall be used to resolve the disagreement.

(ii) Conversely, the Permittee may determine that the organic HAP content of the process fluid does not exceed 5 percent by weight by, for example, accounting for 98 percent of the content and showing that organic HAP is less than 3 percent.

(3) If the Permittee determines that a piece of equipment is in organic HAP service, the determination can be revised after following the procedures in 40 CFR 63.180(d)(1), or by documenting that a change in the process or raw materials no longer causes the equipment to be in organic HAP service.

(4) Samples used in determining the percent organic HAP content shall be representative of the process fluid that is contained in or contacts the equipment.

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

Record Keeping and Reporting Requirement [326 IAC 2-7-5(3)][326 IAC 2-7-19]

CC.17 Recordkeeping Requirements [326 IAC 14][40 CFR 63.181, Subpart H]

(a) Pursuant to 40 CFR 63.181(a), the Permittee of more than one process unit subject to the provisions of 40 CFR 63, Subpart H may comply with the recordkeeping requirements for these process units in one recordkeeping system if the system identifies each record by process unit and the program being implemented (e.g., quarterly monitoring, quality improvement) for each type of equipment. All records and information required by 40 CFR 63.181 shall be maintained in a manner that can be readily accessed at the plant site. This could include physically locating the records at the plant site or accessing the records from a central location by computer at the plant site.

(b) Pursuant to 40 CFR 63.181(b) the following information pertaining to all equipment in each process unit subject to the requirements in 40 CFR 63.162 through 63.174 shall be recorded:

(1) (i) A list of identification numbers for equipment (except connectors exempt from monitoring and recordkeeping identified in 40 CFR 63.174 and instrumentation systems) subject to the requirements of 40 CFR 63, Subpart H. Connectors need not be individually identified if all connectors in a designated area or length of pipe subject to the provisions of 40 CFR 63, Subpart H are identified as a group, and the number of connectors subject is indicated. With respect to connectors, the list shall be complete no later than the completion of the initial survey required by 40 CFR 63.174 (b)(1) or 63.174(b)(2).

(ii) A schedule by process unit for monitoring connectors subject to the provisions of 40 CFR 63.174(a) and valves subject to the provisions of 40 CFR 63.168(d).

(iii) Physical tagging of the equipment to indicate that it is in organic HAP service is not required. Equipment subject to the provisions of 40 CFR 63, Subpart H may be identified on a plant site plan, in log entries, or by other appropriate methods.

(2) (i) A list of identification numbers for equipment that the Permittee elects to equip with a closed-vent system and control device, under the provisions of 40 CFR 63.163(g), 63.164(h), 63.165(c), or 63.173(f).

(ii) A list of identification numbers for compressors that the Permittee elects to designate as operating with an instrument reading of less than 500 parts per million above background, under the provisions of 40 CFR 63.164(i).

(iii) Identification of surge control vessels or bottoms receivers subject to the provisions of 40 CFR 63, Subpart H that the Permittee elects to equip with a closed-vent system and control device, under the provisions of 40 CFR 63.170.

(3) (i) A list of identification numbers for pressure relief devices subject to the provisions in 40 CFR 63.165(a).

(ii) A list of identification numbers for pressure relief devices equipped with rupture disks, under the provisions of 40 CFR 63.165(d).

(4) Identification of instrumentation systems subject to the provisions of 40 CFR 63, Subpart H. Individual components in an instrumentation system need not be identified.

(5) Identification of screwed connectors subject to the requirements of 40 CFR 63.174(c)(2). Identification can be by area or grouping as long as the total number within each group or area is recorded.

(6) The following information shall be recorded for each dual mechanical seal system:

(i) Design criteria required in 40 CFR 63.163(e)(6)(i), 63.164(e)(2), and 63.173(d)(6)(i) and an explanation of the design criteria; and

(ii) Any changes to these criteria and the reasons for the changes.

(7) The following information pertaining to all pumps subject to the provisions of 40 CFR 63.163(j), valves subject to the provisions of 40 CFR 63.168(h) and 63.168(i), agitators subject to the provisions of 40 CFR 63.173(h) through 63.173(j), and connectors subject to the provisions of 40 CFR 63.174(f) and 63.174(g) shall be recorded:

(i) Identification of equipment designated as unsafe to monitor, difficult to monitor, or unsafe to inspect and the plan for monitoring or inspecting this equipment.

(ii) A list of identification numbers for the equipment that is designated as difficult to monitor, an explanation of why the equipment is difficult to monitor, and the planned schedule for monitoring this equipment.

(iii) A list of identification numbers for connectors that are designated as unsafe to repair and an explanation why the connector is unsafe to repair.

(8) (i) A list of valves removed from and added to the process unit, as described in 40 CFR 63.168(e)(1), if the net credits for removed valves is expected to be used.

(ii) A list of connectors removed from and added to the process unit, as described in 40 CFR 63.174(i)(1), and documentation of the integrity of the weld for any removed connectors, as required in 40 CFR 63.174(j). This is not required unless the net credits for removed connectors is expected to be used.

(9) [Reserved]

(10) For any leaks detected as specified in 40 CFR 63.163 and 63.164; 40 CFR 63.168 and 63.169; and 40 CFR 63.172 through 63.174, a weatherproof and readily visible identification, marked with the equipment identification number, shall be attached to the leaking equipment.

(c) Pursuant to 40 CFR 63.181(c), for visual inspections of equipment subject to the provisions 40 CFR 63 Subpart H (e.g., 40 CFR 63.163(b)(3), 63.163(e)(4)(i)), the Permittee shall document that the inspection was conducted and the date of the inspection. The Permittee shall maintain records as specified in 40 CFR 63.181(d) for leaking equipment identified in this inspection. These records shall be retained for 2 years.

(d) Pursuant to 40 CFR 63.181(d), when each leak is detected as specified in 40 CFR 63.163 and 63.164; 40 CFR 63.168 and 63.169; and 40 CFR 63.172 through 63.174, the following information shall be recorded:

(1) The instrument and the equipment identification number and the operator name, initials, or identification number.

(2) The date the leak was detected and the date of first attempt to repair the leak.

(3) The date of successful repair of the leak.

(4) Maximum instrument reading measured by Method 21 of 40 CFR 60, Appendix A after it is successfully repaired or determined to be nonrepairable.

(5) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(i) The Permittee may develop a written procedure that identifies the conditions that justify a delay of repair. The written procedures may be included as part of the startup/shutdown/malfunction plan, required by 40 CFR 63.6(e)(3), for the source or may be part of a separate document that is maintained at the plant site. In such cases, reasons for delay of repair may be documented by citing the relevant sections of the written procedure.

(ii) If delay of repair was caused by depletion of stocked parts, there must be documentation that the spare parts were sufficiently stocked on-site before depletion and the reason for depletion.

(6) Dates of process unit shutdowns that occur while the equipment is unrepaired.

(7) (i) Identification, either by list, location (area or grouping), or tagging of connectors that have been opened or otherwise had the seal broken since the last monitoring period required in 40 CFR 63.174(b), as described in 40 CFR 63.174(c)(1), unless the Permittee elects to comply with the provisions of 40 CFR 63.174(c)(1)(ii).

(ii) The date and results of monitoring as required in 40 CFR 63.174(c). If identification of connectors that have been opened or otherwise had the seal broken is made by location under 40 CFR 63.181(d)(7)(i), then all connectors within the designated location shall be monitored.

(8) [Reserved]

(9) Copies of the periodic reports as specified in 40 CFR 63.182(d), if records are not maintained on a computerized database capable of generating summary reports from the records.

(e) [Reserved]

(f) Pursuant to 40 CFR 63.181(f), the dates and results of each compliance test required for compressors subject to the provisions in 40 CFR 63.164(i) and the dates and results of the monitoring following a pressure release for each pressure relief device subject to the provisions in 40 CFR 63.165(a) and 63.165(b). The results shall include:

(1) The background level measured during each compliance test.

(2) The maximum instrument reading measured at each piece of equipment during each compliance test.

(g) Pursuant to 40 CFR 63.181(g), the Permittee shall maintain records of the information specified in 40 CFR 63.181(g)(1) through 63.181(g)(3) and for closed-vent systems and control devices subject to the provisions of 40 CFR 63.172. The records specified in 40 CFR 63.181(g)(1) shall be retained for the life of the equipment.

(1) The design specifications and performance demonstrations specified in 40 CFR 63.181(g)(1)(i) through 63.181(g)(1)(iv).

(i) Detailed schematics, design specifications of the control device, and piping and instrumentation diagrams.

(ii) The dates and descriptions of any changes in the design specifications.

(iii) [Reserved]

(iv) A description of the parameter or parameters monitored, as required in 40 CFR 63.172(e) to ensure that control devices are operated and maintained in conformance with their design and an explanation of why that parameter (or parameters) was selected for the monitoring.

(2) Records of operation of closed-vent systems and control devices, as specified in 40 CFR 63.181(g)(2)(i) through 63.181(g)(2)(iii).

(i) Dates and durations when the closed-vent systems and control devices required in 40 CFR 63.163 through 63.166, and 63.170 are not operated as designed as indicated by the monitored parameters.

(ii) Dates and durations during which the monitoring system or monitoring device is inoperative.

(iii) Dates and durations of start-ups and shutdowns of control devices required in 40 CFR 63.163 through 63.166, and 63.170.

(3) Records of inspections of closed-vent systems subject to the provisions of 40 CFR 63.172, as specified in 40 CFR 63.181(g)(3)(i) and 63.181(g)(3)(ii).

(i) For each inspection conducted in accordance with the provisions of 40 CFR 63.172(f)(1) or 63.172(f)(2) during which no leaks were detected, a record that the inspection was performed, the date of the inspection, and a statement that no leaks were detected.

(ii) For each inspection conducted in accordance with the provisions of 40 CFR 63.172(f)(1) or 63.172(f)(2) during which leaks were detected, the information specified in 40 CFR 63.181(d) shall be recorded.

(h) Pursuant to 40 CFR 63.181(h), each Permittee of a process unit subject to the requirements of 63.176 shall maintain the records specified in 40 CFR 63.181(h)(3) through 63.181(h)(9) for the period of the quality improvement program for the process unit.

(1) [Reserved]

(2) [Reserved]

(3) For Permittee subject to the requirements of the pump quality improvement program as specified in 40 CFR 63.176:

(i) All data required in 40 CFR 63.176(d)(2).

(ii) The rolling average percent leaking pumps.

(iii) Documentation of all inspections conducted under the requirements of 40 CFR 63.176(d)(4), and any recommendations for design or specification changes to reduce leak frequency.

(iv) The beginning and ending dates while meeting the requirements of 40 CFR 63.176(d).

(4) If a leak is not repaired within 15 calendar days after discovery of the leak, the reason for the delay and the expected date of successful repair.

(5) Records of all analyses required in 40 CFR 63.176(d). The records will include the following:

(i) A list identifying areas associated with poorer than average performance and the associated service characteristics of the stream, the operating conditions and maintenance practices.

(ii) The reasons for rejecting specific candidate superior emission performing valve or pump technology from performance trials.

(iii) The list of candidate superior emission performing valve or pump technologies, and documentation of the performance trial program items required under 40 CFR 63.176(d)(6)(iii).

(iv) The beginning date and duration of performance trials of each candidate superior emission performing technology.

(6) All records documenting the quality assurance program for valves or pumps as specified in 40 CFR 63.176(d)(7).

(7) Records indicating that all valves or pumps replaced or modified during the period of the quality improvement program are in compliance with the quality assurance requirements in 40 CFR 63.176(d)(7).

(8) Records documenting compliance with the 20 percent or greater annual replacement rate for pumps as specified in 40 CFR 63.176(d)(8).

(9) Information and data to show the corporation has fewer than 100 employees, including employees providing professional and technical contracted services.

(i) Pursuant to 40 CFR 63.181(i), the Permittee of equipment in heavy liquid service shall comply with the requirements of either 40 CFR 63.181(i)(1) or 63.181(i)(2), as provided in 63.181(i)(3).

(1) Retain information, data, and analyses used to determine that a piece of equipment is in heavy liquid service.

(2) When requested by IDEM, OAQ, demonstrate that the piece of equipment or process is in heavy liquid service.

(3) A determination or demonstration that a piece of equipment or process is in heavy liquid service shall include an analysis or demonstration that the process fluids do not meet the definition of “in light liquid service.” Examples of information that could document this include, but are not limited to, records of

chemicals purchased for the process, analyses of process stream composition, engineering calculations, or process knowledge.

(j) Pursuant to 40 CFR 63.181(j), identification, either by list, location (area or group) of equipment in organic HAP service less than 300 hours per year within a process unit subject to the provisions of 40 CFR Part 63, Subpart H under 63.160.

(k) [Reserved]

CC.18 Reporting Requirements [326 IAC 14][40 CFR 63.182, Subpart H]

(a) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) Pursuant to 40 CFR 63.182(d), the Permittee of a source subject to 40 CFR 63, Subpart H shall submit Periodic Reports.

(1) A report containing the information in 40 CFR 63.182(d)(2) shall be submitted semiannually.

(2) For each process unit complying with the provisions of 40 CFR 63.163 through 63.174, the summary information listed in 40 CFR 63.182(d)(2)(i) through 63.182(d)(2)(xvi) for each monitoring period during the 6-month period.

(i) The number of valves for which leaks were detected as described in 40 CFR 63.168(b), the percent leakers, and the total number of valves monitored;

(ii) The number of valves for which leaks were not repaired as required in 40 CFR 63.168(f), identifying the number of those that are determined nonrepairable;

(iii) The number of pumps for which leaks were detected as described in 40 CFR 63.163(b), the percent leakers, and the total number of pumps monitored;

(iv) The number of pumps for which leaks were not repaired as required in 40 CFR 63.163(c);

(v) The number of compressors for which leaks were detected as described in 40 CFR 63.164(f);

(vi) The number of compressors for which leaks were not repaired as required in 40 CFR 63.164(g);

(vii) The number of agitators for which leaks were detected as described in 40 CFR 63.173(a) and 63.173(b);

(viii) The number of agitators for which leaks were not repaired as required in 40 CFR 63.173(c);

(ix) The number of connectors for which leaks were detected as described in 40 CFR 63.174(a), the percent of connectors leaking, and the total number of connectors monitored;

(x) [Reserved]

(xi) The number of connectors for which leaks were not repaired as required in 40 CFR 63.174(d), identifying the number of those that are determined nonrepairable;

(xii) [Reserved]

(xiii) The facts that explain any delay of repairs and, where appropriate, why a process unit shutdown was technically infeasible.

(xiv) The results of all monitoring to show compliance with 40 CFR 63.164(i), 63.165(a), and 63.172(f) conducted within the semiannual reporting period.

(xv) If applicable, the initiation of a monthly monitoring program under 40 CFR 63.168(d)(1)(i) or a quality improvement program under either 40 CFR 63.176.

(xvi) If applicable, notification of a change in connector monitoring alternatives as described in 40 CFR 63.174(c)(1).

(xvii) If applicable, the compliance option that has been selected under 40 CFR 63.172(n).

(3) [Reserved]

(4) Any revisions to items reported in earlier Notification of Compliance Status, if the method of compliance has changed since the last report.

SECTION DD 40 CFR Part 63, Subpart YY - National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards

Definitions contained in 40 CFR Part 63, Subpart YY, Section 1101 are applicable to the Permittee.

Emissions Limitations and Standards

DD.1 Applicability: [326 IAC 14][40 CFR 63.1100 Subpart YY]

(a) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(1) If a process unit only manufactures one product, then that product shall represent the primary product of the process unit.

(2) If a process unit is designed and operated as a flexible operation unit, the primary product shall be determined as specified in 40 CFR 63.1100(d)(2)(i) or 63.1100(d)(2)(ii) based on the anticipated operations for the 5 years following the promulgation date for existing affected sources and for the first 5 years after initial startup for new affected sources.

(i) If the flexible operation unit will manufacture one product for the greatest percentage of operating time over the five-year period, then that product shall represent the primary product of the flexible operation unit.

(ii) If the flexible operation unit will manufacture multiple products equally based on operating time, then the product with the greatest production on a mass basis over the five-year period shall represent the primary product of the flexible operation unit.

(3) Once the primary product of a process unit has been determined to be a product produced by a source category subject to 40 CFR 63, Subpart YY, the Permittee of the affected source shall comply with the standards for the primary product production process unit.

(4) The determination of the primary product for a process unit, including the assessment of applicability of 40 CFR 63, Subpart YY to process units that are designed and operated as flexible operation units, shall be reported in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4) when the primary product is determined to be a product produced by a source category subject to requirements under 40 CFR 63, Subpart YY. The Notification of Compliance Status shall include the information specified in either 40 CFR 63.1100(d)(4)(i) or 63.1100(d)(4)(ii). If the primary product is determined to be something other than a product produced by a source category subject to requirements under 40 CFR 63, Subpart YY, the Permittee shall retain information, data, and analyses used to document the basis for the determination that the primary product is not produced by a source category subject to requirements under 40 CFR 63, Subpart YY.

(i) If the process unit manufactures only one product subject to requirements under 40 CFR 63, Subpart YY, the identity of that product.

(ii) If the process unit is designed and operated as a flexible operation unit, the information specified in 40 CFR 63.1100(d)(4)(ii)(A) and 63.1100(d)(4)(ii)(B), as appropriate.

(A) The identity of the primary product.

(B) Information concerning operating time and/or production mass for each product that was used to make the determination of the primary product under 40 CFR 63.1100(d)(2)(i) or 63.1100(d)(2)(ii).

(5) When a flexible operation unit that is subject to 40 CFR 63, Subpart YY is producing a product other than a product subject to 40 CFR 63, Subpart YY, or is producing a product subject to 40 CFR 63, Subpart YY that is not the primary product, the Permittee shall comply with either 40 CFR 63.1100(d)(5)(i) or 63.1100(d)(5)(ii) for each emission point.

(i) The Permittee shall control emissions during the production of all products in accordance with the requirements for the production of the primary product. As appropriate, the Permittee shall demonstrate that the parameter monitoring level established for the primary product is also appropriate for those periods when products other than the primary product are being produced. Documentation of this demonstration shall be submitted in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(ii) The Permittee shall determine, for the production of each product, whether control is required in accordance with the applicable criteria for the primary product in 40 CFR 63.1103. If control is required, the Permittee shall establish separate parameter monitoring levels, as appropriate, for the production of each product. The parameter monitoring levels developed shall be submitted in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(e) Pursuant to 40 CFR 63.1100(e), to determine the process unit to which a storage vessel shall belong, the Permittee shall sequentially follow the procedures specified in 40 CFR 63.1100(e)(1) through 63.1100(e)(8), stopping as soon as the determination is made.

(1) If a storage vessel is already subject to another 40 CFR Part 63 Subpart on the date of promulgation for an affected source under the generic MACT, that storage vessel shall belong to the process unit subject to the other Subpart.

(2) If a storage vessel is dedicated to a single process unit, the storage vessel shall belong to that process unit.

(3) If a storage vessel is shared among process units, then the storage vessel shall belong to that process unit located on the same plant site as the storage vessel that has the greatest input into or output from the storage vessel (i.e., the process unit has the predominant use of the storage vessel.)

(4) If predominant use cannot be determined for a storage vessel that is shared among process units and if only one of those process units is subject to 40 CFR 63, Subpart YY, the storage vessel shall belong to that process unit.

(5) If predominant use cannot be determined for a storage vessel that is shared among process units and if more than one of the process units are subject to standards under 40 CFR 63, Subpart YY that have different primary products,

then the Permittee shall assign the storage vessel to any one of the process units sharing the storage vessel.

(6) If the predominant use of a storage vessel varies from year to year, then predominant use shall be determined based on the utilization that occurred during the year preceding the date of promulgation of standards for an affected source under 40 CFR 63, Subpart YY or based on the expected utilization for the 5 years following the promulgation date of standards for an affected source under 40 CFR 63, Subpart YY for existing affected sources, whichever is more representative of the expected operations for that storage vessel, and based on the expected utilization for the 5 years after initial startup for new affected sources. The determination of predominant use shall be reported in the Notification of Compliance Status Report required by 40 CFR 63.1110(a)(4). If the predominant use changes, the redetermination of predominant use shall be reported in the next Periodic Report.

(7) If the storage vessel begins receiving material from (or sending material to) another process unit; ceases to receive material from (or send material to) a process unit; or if the applicability of 40 CFR 63, Subpart YY to a storage vessel has been determined according to the provisions of 40 CFR 63.1100(e)(1) through 63.1100(e)(6) and there is a significant change in the use of the storage vessel that could reasonably change the predominant use, the Permittee shall reevaluate the applicability of 40 CFR 63, Subpart YY to the storage vessel.

(8) Where a storage vessel is located at a major source that includes one or more process units that place material into, or receive materials from, the storage vessel, but the storage vessel is located in a tank farm, the applicability of 40 CFR 63, Subpart YY shall be determined according to the provisions in 40 CFR 63.1100(e)(8)(i) through 63.1100(e)(8)(iii).

(i) The storage vessel may only be assigned to a process unit that utilizes the storage vessel and does not have an intervening storage vessel for that product (or raw material, as appropriate). With respect to any process unit, an intervening storage vessel means a storage vessel connected by hard-piping to the process unit and to the storage vessel in the tank farm so that product or raw material entering or leaving the process unit flows into (or from) the intervening storage vessel and does not flow directly into (or from) the storage vessel in the tank farm.

(ii) If there is only one process unit at a major source that meets the criteria of 40 CFR 63.1100(e)(8)(i) with respect to a storage vessel, the storage vessel shall be assigned to that process unit.

(iii) If there are two or more process units at the major source that meet the criteria of 40 CFR 63.1100(e)(8)(i) with respect to a storage vessel, the storage vessel shall be assigned to one of those process units according to the provisions of 40 CFR 63.1100(e)(6). The predominant use shall be determined among only those process units that meet the criteria of 40 CFR 63.1100(e)(8)(i).

(f) Pursuant to 40 CFR 63.1100(f), to determine the process unit to which recovery equipment shall belong, the Permittee shall sequentially follow the procedures specified in 40 CFR 63.1100(f)(1) through 63.1100(f)(7), stopping as soon as the determination is made.

(1) If recovery operation equipment is already subject to another 40 CFR Part 63, Subpart on the date standards are promulgated for an affected source, that

recovery operation equipment shall belong to the process unit subject to the other Subpart.

(2) If recovery operation equipment is used exclusively by a single process unit, the recovery operation shall belong to that process unit.

(3) If recovery operation equipment is shared among process units, then the recovery operation equipment shall belong to that process unit that has the greatest input into or output from the recovery operation equipment (i.e., that process unit has the predominant use of the recovery operation equipment).

(4) If predominant use cannot be determined for recovery operation equipment that is shared among process units and if one of those process units is a process unit subject to 40 CFR Part 63, Subpart YY, the recovery operation equipment shall belong to the process unit subject to 40 CFR Part 63, Subpart YY.

(5) If predominant use cannot be determined for recovery operation equipment that is shared among process units and if more than one of the process units are process units that have different primary products and that are subject to 40 CFR Part 63, Subpart YY, then the Permittee shall assign the recovery operation equipment to any one of those process units.

(6) If the predominant use of recovery operation equipment varies from year to year, then the predominant use shall be determined based on the utilization that occurred during the year preceding the promulgation date of standards for an affected source under 40 CFR 63, Subpart YY or based on the expected utilization for the 5 years following the promulgation date for standards for an affected source under 40 CFR 63, Subpart YY for existing affected sources, whichever is the more representative of the expected operations for the recovery operations equipment, and based on the expected utilization for the first 5 years after initial startup for new affected sources. This determination shall be reported in the Notification of Compliance Status Report required by 40 CFR 63.1110(a)(4). If the predominant use changes, the redetermination of predominant use shall be reported in the next Periodic Report.

(7) If there is an unexpected change in the utilization of recovery operation equipment that could reasonably change the predominant use, the Permittee shall redetermine to which process unit the recovery operation belongs by reperforming the procedures specified in 40 CFR 63.1100(f)(2) through 63.1100(f)(6).

(g) Pursuant to 40 CFR 63.1100(g), paragraphs 40 CFR 63.1100(g)(1) through 63.1100(g)(6) specify the applicability of 40 CFR Subpart YY emission point requirements when other rules may apply. Where 40 CFR Part 63, Subpart YY allows a Permittee an option to comply with one or another regulation to comply with 40 CFR Part 63, Subpart YY, a Permittee must report which regulation they choose to comply with in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(1) Overlap of 40 CFR Part 63, Subpart YY with other regulations for storage vessels.

(i) After the compliance dates specified in 40 CFR 63.1102, a storage vessel that must be controlled according to the requirements of 40 CFR Part 63, Subpart YY and Part 63, Subpart G is required to comply only with the storage vessel requirements of 40 CFR 63, Subpart YY.

(ii) After the compliance dates specified in 40 CFR 63.1102, a storage vessel that must be controlled according to the requirements of 40 CFR

Part 63, Subpart YY and Subpart Ka or Kb of 40 CFR Part 60 is required to comply only with the storage vessel requirements of 40 CFR Part 63, Subpart YY.

(2) Overlap of 40 CFR Part 63, Subpart YY with other regulations for process vents.

(i) After the compliance dates specified in 40 CFR 63.1102, a process vent that must be controlled according to the requirements of 40 CFR Part 63, Subpart YY and Part 63, Subpart G is in compliance with 40 CFR Part 63, Subpart YY if it complies with either set of requirements. The Permittee must specify the rule with which they will comply in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(ii) After the compliance dates specified in 40 CFR 63.1102, a process vent that must be controlled according to the requirements of 40 CFR Part 63, Subpart YY and Subpart III, RRR or NNN of 40 CFR Part 60 is required to comply only with the process vent requirements of 40 CFR Part 63, Subpart YY.

(3) Overlap of 40 CFR Part 63, Subpart YY with other regulations for transfer racks. After the compliance dates specified in 40 CFR 63.1102, a transfer rack that must be controlled according to the requirements 40 CFR Part 63, Subpart YY and Part 63, Subpart G is required to comply only with the transfer rack requirements of 40 CFR Part 63, Subpart YY.

(4) Overlap of 40 CFR Part 63, Subpart YY with other regulations for equipment leaks.

(i) After the compliance dates specified in 40 CFR 63.1102, equipment that must be controlled according to 40 CFR Part 63, Subpart YY and 40 CFR Part 60, Subpart VV, or 40 CFR Part 61, Subpart J or Subpart V, is required only to comply with the equipment leak requirements of 40 CFR Part 63, Subpart YY.

(ii) After the compliance dates specified in 40 CFR 63.1102, equipment that must be controlled according to 40 CFR Part 63, Subpart YY and Part 63, Subpart H of is in compliance with the equipment leak requirements of 40 CFR Part 63, Subpart YY if it complies with either set of requirements. The Permittee must specify the rule with which they will comply in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(5) Overlap of 40 CFR Part 63, Subpart YY with other regulations for wastewater for source categories other than ethylene production.

(i) After the compliance dates specified in 40 CFR 63.1102 for an affected source subject to 40 CFR Part 63, Subpart YY, a wastewater stream that is subject to the wastewater requirements of 40 CFR Part 63, Subpart YY and the wastewater requirements of Part 63, Subparts F, G, and H (collectively known as the “HON”) shall be deemed to be in compliance with the requirements of 40 CFR Part 63, Subpart YY if it complies with either set of requirements. In any instance where a source subject to 40 CFR Part 63, Subpart YY is colocated with a Synthetic Organic Chemical Manufacturing Industry (SOCMI) source, and a single wastewater treatment facility treats both Group 1 wastewaters and wastewater residuals from the source subject to 40 CFR Part 63, Subpart YY and wastewaters from the SOCMI source, a certification by the treatment

facility that they will manage and treat the waste in conformity with the specific control requirements set forth in 40 CFR 63.133 through 63.147 will also be deemed sufficient to satisfy the certification requirements for wastewater treatment under 40 CFR Part 63, Subpart YY.

(ii) After the compliance dates specified in 40 CFR 63.1102 for an affected source subject to 40 CFR Part 63, Subpart YY, a wastewater stream that is subject to control requirements in the Benzene Waste NESHAP (40 CFR Part 61, Subpart FF) and 40 CFR Part 63, Subpart YY is required to comply with both rules.

(6) Overlap of 40 CFR Part 63, Subpart YY with other regulations for waste for the ethylene production source category.

(i) After the compliance date specified in 40 CFR 63.1102, a waste stream that is conveyed, stored, or treated in a wastewater stream management unit, waste management unit, or wastewater treatment system that receives streams subject to both the control requirements of 40 CFR 63.1103(e)(3) for ethylene production sources and the provisions of 40 CFR 63.133 through 63.147 shall comply as specified in 40 CFR 63.1100(g)(6)(i)(A) through 63.1100(g)(6)(i)(C). Compliance with the provisions of 40 CFR 63.1100(g)(6)(i) shall constitute compliance with the requirements of 40 CFR Part 63, Subpart YY for that waste stream.

(A) Comply with the provisions in 40 CFR 63.133 through 63.137 and 63.140 for all equipment used in the storage and conveyance of the waste stream.

(B) Comply with the provisions in 40 CFR 63.1103(e), 63.138, and 63.139 for the treatment and control of the waste stream.

(C) Comply with the provisions in 40 CFR 63.143 through 63.148 for monitoring and inspections of equipment and for recordkeeping and reporting requirements. The Permittee is not required to comply with the monitoring, recordkeeping, and reporting requirements associated with the treatment and control requirements in 40 CFR 61.355 through 61.357.

(ii) After the compliance date specified in 40 CFR 63.1102, compliance with 63.1103(e) shall constitute compliance with the Benzene Waste Operations NESHAP (40 CFR Part 61, Subpart FF) for waste streams that are subject to both the control requirements of 40 CFR 63.1103(e)(3) for ethylene production sources and the control requirements of 40 CFR Part 61, Subpart FF.

DD.2 Source category-specific requirements: [326 IAC 14][40 CFR 63.1103 Subpart YY]

(a) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) Pursuant to 40 CFR 63.1103(d), polycarbonate production applicability, definitions, and requirements:

(1) Applicability

(i) Affected source. For the polycarbonate production (as defined in 40 CFR 63.1103(d)(2)) source category, the affected source shall comprise all

emission points, in combination, listed in 40 CFR 63.1103(d)(1)(i)(A) through 63.1103(d)(1)(i)(D), that are part of a polycarbonate production process unit located at a major source as defined in Section 112(a) of the Clean Air Act. For the purposes of this rule, a polycarbonate production process unit is a unit that produces polycarbonate by interfacial polymerization from bisphenols and phosgene. Phosgene production units that are associated with polycarbonate production process units are considered to be part of the polycarbonate production process. A phosgene production unit consists of the reactor in which phosgene is formed and all equipment (listed in 40 CFR 63.1103(d)(1)(i)(A) through 63.1103(d)(1)(i)(D)) downstream of the reactor that provides phosgene for the production of polycarbonate. Therefore, for the purposes of this rule, such a phosgene production unit is considered to be a polycarbonate production process unit.

(A) All storage vessels that store liquids containing organic HAP.

(B) All process vents from continuous and batch unit operations.

(C) All wastewater streams.

(D) Equipment (as defined in 40 CFR 63.1101) that contains or contacts organic HAP.

(ii) Compliance schedule. The compliance schedule, for affected sources as defined in 40 CFR 63.1103(d)(1)(i), is specified in 40 CFR 63.1102(a).

(2) Definitions. Polycarbonate production means a process engaged in the production of a special class of polyester formed from any dihydroxy compound and any carbonate diester or by ester exchange. Polycarbonate may be produced by solution or emulsion polymerization, although other methods may be used. A typical method for the manufacture of polycarbonate includes the reaction of bisphenol-A with phosgene in the presence of pyridine or other catalyst to form polycarbonate. Methylene chloride or other solvents are used in this polymerization reaction.

(3) Requirements. Tables 5 and 6 of 40 CFR 63.1103 specify the applicability criteria and standards for existing and new sources within the polycarbonate production source category. The Permittee must control organic HAP emissions from each affected source emission point by meeting the applicable requirements specified in Tables 5 and 6 of 40 CFR 63.1103. Applicability assessment procedures and methods are specified in 40 CFR 63.1104 through 63.1107. A Permittee of an affected source is not required to perform tests, TRE calculations or other applicability assessment procedures if they opt to comply with the most stringent requirements for an applicable emission point pursuant to 40 CFR Part 63, Subpart YY. General compliance, recordkeeping, and reporting requirements are specified in 40 CFR 63.1108 through 63.1112.

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

DD.3 Wastewater provisions: [326 IAC 14][40 CFR 63.1106 Subpart YY]

(a) Pursuant to 40 CFR 63.1106(a), process wastewater; Except as specified in 40 CFR 63.1106(a)(1) through 63.1106(a)(16), the Permittee of each affected source shall comply with the HON process wastewater requirements in 40 CFR 63.132 through 63.148.

(1) When terms used in 40 CFR 63.132 through 63.148 are defined in 40 CFR 63.1101, the definition in 63.1101 shall apply, for the purposes of Subpart YY. For terms used in 40 CFR 63.132 through 63.148 that are not defined in 40 CFR 63.1101, the definitions in 40 CFR 63.101 and 63.111 shall apply.

(2) When the term chemical manufacturing production process unit, or CMPU, is used in 40 CFR 63.132 through 63.148, the phrase “a process unit whose primary product is a product produced by a source category subject to 40 CFR 63, Subpart YY” shall apply, for the purposes of 40 CFR 63, Subpart YY.

(3) The Permittee of affected sources are not required to comply with 40 CFR 63.132(b)(1), 63.132(d), and 63.138(c). Further, the Permittee is exempt from all requirements in 40 CFR 63.132 through 63.148 that pertain solely and exclusively to organic HAP listed in Table 8 of 40 CFR Part 63, Subpart G.

(4) When the determination of equivalence criteria in 40 CFR 63.102(b) is referred to in 40 CFR 63.132, 63.133, and 63.137, the alternative nonopacity emission standard provisions in 40 CFR 63.6(g) shall apply, for the purposes of 40 CFR 63, Subpart YY.

(5) When the HON storage vessel requirements for internal floating roofs contained in 40 CFR 63.119(b) are referred to in 63.133(a)(2)(ii), the requirements in 40 CFR 63.1063(a)(1)(i), 63.1063(a)(2), and 63.1063(b) shall apply, for the purposes of 40 CFR 63, Subpart YY.

(6) When the HON storage vessel requirements for external floating roofs in 40 CFR 63.119(c), 63.120(b)(5) and 63.120(b)(6) are referred to in 40 CFR 63.133(a)(2)(iii) and 63.133(d), the requirements in 40 CFR 63.1063(a)(1)(ii), 63.1063(a)(2), and 63.1063(b) shall apply, for the purposes of 40 CFR 63, Subpart YY.

(7) For the purposes of 40 CFR 63, Subpart YY, 63.1063(c)(2)(iv) shall apply instead of 63.133(e).

(8) [Reserved]

(9) When 40 CFR 63.147(d) requires the Permittee to keep records of the daily average value of each continuously monitored parameter for each operating day as specified in 40 CFR 63.152(f), the Permittee shall keep records of each continuously monitored parameter for each operating day as specified in 40 CFR 63.998(b).

(10) When 40 CFR 63.132(a) and 63.132(b) refer to the “applicable dates specified in 40 CFR 63.100 of Subpart F,” the applicable compliance dates specified in 40 CFR 63.1102 shall apply, for purposes of 40 CFR 63, Subpart YY.

(11) Where 40 CFR 63.152(b) and/or the Notification of Compliance Status is referred to in 40 CFR 63.132 through 63.148, the Notification of Compliance Status requirements contained in 40 CFR 63.1110(a)(3) shall apply, for purposes of 40 CFR 63, Subpart YY.

(12) Where 40 CFR 63.152(c) and/or the Periodic Report requirements are referred to 40 CFR 63.132 through 63.148, the Periodic Report requirements contained in 40 CFR 63.1110(a)(4) shall apply, for purposes of 40 CFR 63, Subpart YY.

(13) When Method 18 of Appendix A to Part 60 specified in 40 CFR 63.139(e)(1)(ii), 63.145(d)(4), or 63.145(i)(2), either Method 18 or Method 25A may be used. The use of Method 25A of Appendix A to Part 60 shall comply with 40 CFR 63.1106(a)(13)(i) and 63.1106(a)(13)(ii).

(i) The organic HAP used as the calibration gas for Method 25A of Appendix A of Part 60 shall be the single organic HAP representing the largest percent by volume of the emissions.

(ii) The use of Method 25A of Appendix A of Part 60 is acceptable if the response from the high-level calibration gas is at least 20 times the standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(14) When the HON recordkeeping requirements for by-pass lines in 40 CFR 63.118(a)(3) is referred to in 40 CFR 63.148(f), the requirements in 40 CFR 63.998(d)(1)(ii)(A) shall apply, for the purposes of 40 CFR 63, Subpart YY.

(15) When the Initial Notification requirements in 40 CFR 63.182(b) are referred to in 40 CFR 63.148(j), the requirements in 40 CFR 63.1110(c) shall apply, for the purposes of 40 CFR 63, Subpart YY.

(16) For the purposes of 40 CFR 63, Subpart YY, 40 CFR 63.148(k) shall not apply.

(b) Pursuant to 40 CFR 63.1106(b), maintenance wastewater; The Permittee of each affected source shall comply with the HON maintenance wastewater requirements in 40 CFR 63.105. When terms used in 40 CFR 63.105 are defined in 40 CFR 63.1101, the definition in 40 CFR 63.1101 shall apply, for the purpose of 40 CFR 63, Subpart YY. For terms used in 40 CFR 63.105 that are not defined in 40 CFR 63.1101, the definitions in 40 CFR 63.101 and 63.111 shall apply.

(c) Pursuant to 40 CFR 63.1106(c), liquid streams in open systems; The Permittee shall comply with the provisions of Table 35 of 40 CFR Part 63, Subpart G for each item of equipment meeting the criteria specified in 40 CFR 63.1106(c)(1) through 63.1106(c)(3) and either 40 CFR 63.1106(c)(4)(i) or 63.1106(c)(4)(ii), with the exceptions provided in 40 CFR 63.1106(c)(5) and 63.1106(c)(6).

(1) The item of equipment is one of the types of equipment identified in 40 CFR 63.1106(c)(1)(i) through 63.1106(c)(1)(vii).

(i) Drain or drain hub;

(ii) Manhole (including sumps and other points of access to a conveyance system);

(iii) Lift station;

(iv) Trench;

(v) Pipe;

(vi) Oil/water separator; and

(vii) Tanks with capacities of 38 m3 or greater.

(2) The item of equipment is part of an affected source that is subject to 40 CFR 63, Subpart YY.

(3) The item of equipment is controlled less stringently than in Table 35 of 40 CFR Part 63, Subpart G, and the item of equipment is not otherwise exempt from the provisions of 40 CFR 63, Subpart YY, or a referenced Subpart.

(4) The item of equipment:

(i) Is a drain, drain hub, manhole, lift station, trench, pipe, or oil/water separator that conveys water with a total annual average concentration greater than or equal to 10,000 parts per million by weight of Table 9 compounds (as defined under 40 CFR 63, Subpart YY) at any flow rate; or a total annual average concentration greater than or equal to 1,000 parts per million by weight of Table 9 compounds (as defined under 40 CFR 63, Subpart YY) at an annual average flow rate greater than or equal to 10 liters per minute.

(ii) Is a tank that receives one or more streams that contain water with a total annual average concentration greater than or equal to 1,000 parts per million by weight of Table 9 compounds (as defined under 40 CFR 63, Subpart YY) at an annual average flow rate greater than or equal to 10 liters per minute. The Permittee shall determine the characteristics of the stream as specified in 40 CFR 63.1106(c)(4)(ii)(A) and 63.1106(c)(4)(ii)(B).

(A) The characteristics of the stream being received shall be determined at the inlet to the tank.

(B) The characteristics shall be determined according to the procedures in 40 CFR 63.144(b) and 63.144(c).

(5) When terms used in Table 35 of 40 CFR Part 63, Subpart G are defined in 40 CFR 63.1101, the definition in 63.1101 shall apply, for the purpose of 40 CFR 63, Subpart YY. For terms used in Table 35 of 40 CFR Part 63, Subpart G that are not defined in 40 CFR 63.1101, the definitions in 40 CFR 63.101 and 63.111 shall apply.

(6) When Table 35 of 40 CFR Part 63, Subpart G refers to 40 CFR 63.119(e)(1) or 63.119(e)(2) in the requirements for tanks, the requirements in 40 CFR 63.982(a)(1) shall apply, for purposes of 40 CFR 63, Subpart YY.

(d) [Reserved]

Compliance Determination Requirements

DD.4 Process vents from continuous unit operations: applicability assessment procedures and methods: [326 IAC 14][40 CFR 63.1104 Subpart YY]

(a) Pursuant to 40 CFR 63.1104(a), general. The provisions of 40 CFR 63.1104 provide calculation and measurement methods for criteria that are required by 40 CFR 63.1103(d) to be used to determine applicability of the control requirements for process vents from continuous unit operations. The Permittee of a process vent is not required to determine the criteria specified for a process vent that is being controlled in accordance with the applicable weight-percent, TOC concentration, or organic HAP concentration requirement in Table 5 or 6 of 40 CFR 63.1103(d).

(b) Pursuant to 40 CFR 63.1104(b), sampling sites; For purposes of determining process vent applicability criteria, the sampling site shall be located as specified in 40 CFR 63.1104(b)(1) through 63.1104(b)(4), as applicable.

(1) Sampling site location if TRE determination is required. If the applicability criteria specified in Table 5 or 6 of 40 CFR 63.1103(d) includes a TRE index value, the sampling site for determining volumetric flow rate, regulated organic HAP concentration, total organic HAP or TOC concentration, heating value, and TRE index value, shall be after the final recovery device (if any recovery devices are present) but prior to the inlet of any control device that is present, and prior to release to the atmosphere.

(2) Sampling site location if TRE determination is not required. If the applicability criteria specified in Table 5 or 6 of 40 CFR 63.1103(d) does not include a TRE index value, the sampling site for determining volumetric flow rate, regulated organic HAP concentration, total organic HAP or TOC concentration, and any other specified parameter shall be at the exit from the unit operation before any control device.

(3) Sampling site selection method. Method 1 or 1A of 40 CFR Part 60, Appendix A, as appropriate, shall be used for selection of the sampling site. No traverse site selection method is needed for process vents smaller than 0.10 meter (0.33 foot) in nominal inside diameter.

(4) Sampling site when a halogen reduction device is used prior to a combustion device. A Permittee using a scrubber to reduce the process vent halogen atom mass emission rate to less than 0.45 kilograms per hour (0.99 pound per hour) prior to a combustion control device in compliance with 40 CFR 63.1103 (as appropriate) shall determine the halogen atom mass emission rate prior to the combustion device according to the procedures in 40 CFR 63.1104(i).

(c) Pursuant to 40 CFR 63.1104(c), applicability assessment requirement; The TOC or organic HAP concentrations, process vent volumetric flow rates, process vent heating values, process vent TOC or organic HAP emission rates, halogenated process vent determinations, process vent TRE index values, and engineering assessments for process vent control applicability assessment requirements are to be determined during maximum representative operating conditions for the process, except as provided in 40 CFR 63.1104(d), or unless IDEM, OAQ specifies or approves alternate operating conditions. Operations during periods of startup, shutdown, and malfunction shall not constitute representative conditions for the purpose of an applicability test.

(d) [Reserved]

(e) Pursuant to 40 CFR 63.1104(e), TOC or Organic HAP concentration; The TOC or organic HAP concentrations shall be determined based on 40 CFR 63.1104(e)(1), 63.1104(e)(2), or 63.1104(k), or any other method or data that have been validated according to the protocol in Method 301 of 40 CFR Part 63, Appendix A. For concentrations needed for comparison with the appropriate control applicability concentrations specified in Table 5 or 6 of 40 CFR 63.1103(d), TOC or organic HAP concentration shall be determined based on 40 CFR 63.1104(e)(1), 63.1104(e)(2), or 63.1104(k) or any other method or data that has been validated according to the protocol in Method 301 of 40 CFR Part 63, Appendix A. The Permittee shall record the TOC or organic HAP concentration as specified in 40 CFR 63.1104(l)(3).

(1) Method 18. The procedures specified in 40 CFR 63.1104(e)(1)(i) and 63.1104(e)(1)(ii) shall be used to calculate parts per million by volume concentration using Method 301 of 40 CFR Part 63, Appendix A:

(i) The minimum sampling time for each run shall be 1 hour in which either an integrated sample or four grab samples shall be taken. If grab sampling is used, then the samples shall be taken at approximately equal intervals in time, such as 15-minute intervals during the run.

(ii) The concentration of either TOC (minus methane and ethane) or regulated organic HAP emissions shall be calculated according to 40 CFR 63.1104(e)(1)(ii)(A) or 63.1104(e)(1)(ii)(B), as applicable.

(A) The TOC concentration (CTOC) is the sum of the concentrations of the individual components and shall be computed for each run using Equation 1:

$$C_{TOC} = \frac{\sum_{i=1}^{x}\left(\sum_{j=1}^{n} C_{ji}\right)}{x} \qquad [Eq.\ 1]$$

Where:

CTOC = Concentration of TOC (minus methane and ethane), dry basis, parts per million by volume.

Cji = Concentration of sample component j of the sample i, dry basis, parts per million by volume.

n = Number of components in the sample. x = Number of samples in the sample run.

(B) The regulated organic HAP or total organic HAP concentration (CHAP) shall be computed according to Equation 1 in 40 CFR 63.1104(e)(1)(ii)(A) except that only the regulated or total organic HAP species shall be summed, as appropriate.

(2) Method 25A. The procedures specified in 40 CFR 63.1104(e)(2)(i) through 63.1104(e)(2)(vi) shall be used to calculate parts per million by volume concentration using Method 25A of 40 CFR Part 60, Appendix A.

(i) Method 25A of 40 CFR Part 60, Appendix A shall be used only if a single organic HAP compound comprises greater than 50 percent of total organic HAP or TOC, by volume, in the process vent.

(ii) The process vent composition may be determined by either process knowledge, test data collected using an appropriate Environmental Protection Agency method or a method or data validated according to the protocol in Method 301 of 40 CFR Part 63, Appendix A. Examples of information that could constitute process knowledge include calculations based on material balances, process stoichiometry, or previous test results provided the results are still relevant to the current process vent conditions.

(iii) The organic compound used as the calibration gas for Method 25A of 40 CFR Part 60, Appendix A shall be the single organic HAP compound present at greater than 50 percent of the total organic HAP or TOC by volume.

(iv) The span value for Method 25A of 40 CFR Part 60, Appendix A shall be equal to the appropriate control applicability concentration value specified in the applicable table(s) presented in 40 CFR 63.1103.

(v) Use of Method 25A of 40 CFR Part 60, Appendix A is acceptable if the response from the high-level calibration gas is at least 20 times the

standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(vi) The Permittee shall demonstrate that the concentration of TOC including methane and ethane measured by Method 25A of 40 CFR Part 60, Appendix A is below one-half the appropriate control applicability concentration specified in the applicable table for a subject source category in 40 CFR 63.1103 in order to qualify for a low organic HAP concentration exclusion.

(f) Pursuant to 40 CFR 63.1104(f), the process vent volumetric flow rate (QS), in standard cubic meters per minute at 20 □C, shall be determined as specified in 40 CFR 63.1104(f)(1) or 63.1104(f)(2) and shall be recorded as specified in 40 CFR 63.1109(d).

(1) Use Method 2, 2A, 2C, 2D, 2F, or 2G of 40 CFR Part 60, Appendix A, as appropriate. If the process vent tested passes through a final steam jet ejector and is not condensed, the stream volumetric flow shall be corrected to 2.3 percent moisture; or

(2) The engineering assessment procedures in 40 CFR 63.1104(k) can be used for determining volumetric flow rates.

(g) Pursuant to 40 CFR 63.1104(g), the net heating value shall be determined as specified in 40 CFR 63.1104(g)(1) and 63.1104(g)(2), or by using the engineering assessment procedures in 40 CFR 63.1104(k).

(1) The net heating value of the process vent shall be calculated using Equation 2:

$$H_T = K_1 \left(\sum_{j=1}^{n} D_j H_j \right) \qquad [Eq.\ 2]$$

Where:

HT = Net heating value of the sample, megaJoule per standard cubic meter, where the net enthalpy per mole of process vent is based on combustion at 25°C and 760 millimeters of mercury, but the standard temperature for determining the volume corresponding to 1 mole is 20°C, as in the definition of Qs (process vent volumetric flow rate).

K1 = Constant, 1.740 × 10-7 (parts per million)-1(gram-mole per standard cubic meter) (megaJoule per kilocalorie), where standard temperature for (gram-mole per standard cubic meter) is 20°C.

Dj = Concentration on a wet basis of compound j in parts per million, as measured by procedures indicated in 40 CFR 63.1104(e)(2). For process vents that pass through a final steam jet and are not condensed, the moisture is assumed to be 2.3 percent by volume.

Hj = Net heat of combustion of compound j, kilocalorie per gram-mole, based on combustion at 25°C and 760 millimeters mercury.

(2) The molar composition of the process vent (Dj) shall be determined using the methods specified in 40 CFR 63.1104(g)(2)(i) through 63.1104(g)(2)(iii):

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(h) Pursuant to 40 CFR 63.1104(h), the emission rate of TOC (minus methane and ethane) (ETOC) and the emission rate of the regulated organic HAP or total organic HAP (EHAP)

in the process vent, as required by the TRE index value equation specified in 40 CFR 63.1104(j), shall be calculated using Equation 3:

$$E = K_2 \left(\sum_{j=1}^{n} C_j M_j \right) Q_s \qquad [Eq.\ 3]$$

Where:

E = Emission rate of TOC (minus methane and ethane) (ETOC) or emission rate of the regulated organic HAP or total organic HAP (EHAP) in the sample, kilograms per hour.

K2 = Constant, 2.494 × 10-6 (parts per million)-1 (gram-mole per standard cubic meter) (kilogram/gram) (minutes/hour), where standard temperature for (gram-mole per standard cubic meter) is 20°C.

n = Number of components in the sample.

Cj = Concentration on a dry basis of organic compound j in parts per million as measured by Method 18 of 40 CFR Part 60, Appendix A as indicated in 40 CFR 63.1104(e). If the TOC emission rate is being calculated, Cj includes all organic compounds measured minus methane and ethane; if the total organic HAP emission rate is being calculated, only organic HAP compounds are included; if the regulated organic HAP emission rate is being calculated, only regulated organic HAP compounds are included.

Mj = Molecular weight of organic compound j, gram/gram-mole.

Qs = Process vent flow rate, dry standard cubic meter per minute, at a temperature of 20°C.

(i) Pursuant to 40 CFR 63.1104(i), in order to determine whether a process vent is halogenated, the mass emission rate of halogen atoms contained in organic compounds shall be calculated according to the procedures specified in 40 CFR 63.1104(i)(1) and 63.1104(i)(2). A process vent is considered halogenated if the mass emission rate of halogen atoms contained in the organic compounds is equal to or greater than 0.45 kilograms per hour.

(1) The process vent concentration of each organic compound containing halogen atoms (parts per million by volume, by compound) shall be determined based on one of the procedures specified in 40 CFR 63.1104(i)(1)(i) through 63.1104(i)(1)(iv):

(i) Process knowledge that no halogen or hydrogen halides are present in the process vent, or

(ii) Applicable engineering assessment as discussed in 40 CFR 63.1104(k), or

(iii) Concentration of organic compounds containing halogens or hydrogen halides as measured by Method 26 or 26A of 40 CFR Part 60, Appendix A, or

(iv) Any other method or data that have been validated according to the applicable procedures in Method 301 of 40 CFR Part 63, Appendix A.

(2) Equation 4 shall be used to calculate the mass emission rate of halogen atoms:

$$E = K_2 Q \left(\sum_{j=1}^{n} \sum_{i=1}^{m} C_j * L_{ji} * M_{ji} \right) \quad [Eq. 4]$$

Where:

E = Mass of halogen atoms, dry basis, kilogram per hour,

K2 = Constant, 2.494 × 10-6 (parts per million)-1 (kilogram-mole per standard cubic meter) (minute per hour), where standard temperature is 20°C.

Q = Flow rate of gas stream, dry standard cubic meters per minute, determined according to 40 CFR 63.1104(f)(1) or 63.1104(f)(2).

n = Number of halogenated compounds j in the gas stream.

j = Halogenated compound j in the gas stream.

m = Number of different halogens i in each compound j of the gas stream.

i = Halogen atom i in compound j of the gas stream.

Cj = Concentration of halogenated compound j in the gas stream, dry basis, parts per million by volume.

Lji = Number of atoms of halogen i in compound j of the gas stream.

Mji = Molecular weight of halogen atom i in compound j of the gas stream, kilogram per kilogram-mole.

(j) Pursuant to 40 CFR 63.1104(j), the Permittee shall calculate the TRE index value of the process vent using the equations and procedures in 40 CFR 63.1104(j), as applicable, and shall maintain records specified in 40 CFR 63.1104(l)(1) or 63.1104(m)(2), as applicable.

(1) TRE index value equation. The equation for calculating the TRE index value is Equation 5:

$$TRE = 1/E_{HAP} * [A + B(Q_S) + C(H_T) + D(E_{TOC})] \quad [Eq. 5]$$

Where:

TRE = TRE index value.

A, B, C, D = Coefficients presented in Table 1 of 40 CFR 63.1104.

EHAP = Emission rate of total organic HAP, kilograms per hour, as calculated according to 40 CFR 63.1104(h) or 63.1104(k).

QS = process vent flow rate, standard cubic meters per minute, at a standard temperature of 20°C, as calculated according to 40 CFR 63.1104(f) or 63.1104(k).

HT = process vent net heating value, megaJoules per standard cubic meter, as calculated according to 40 CFR 63.1104(g) or 63.1104(k).

ETOC = Emission rate of TOC (minus methane and ethane), kilograms per hour, as calculated according to 40 CFR 63.1104(h) or 63.1104(k).

(2) Nonhalogenated process vents. The Permittee of a nonhalogenated process vent shall calculate the TRE index value by using the equation and appropriate nonhalogenated process vent parameters in Table 1 of 40 CFR 63.1104 for process vents at existing and new sources. The lowest TRE index value is to be selected.

(3) Halogenated process vents. The Permittee of a halogenated process vent stream, as determined according to procedures specified in 40 CFR 63.1104(i) or 63.1104(k), shall calculate the TRE index value using the appropriate halogenated process vent parameters in Table 1 of 40 CFR 63.1104 for existing and new sources.

(k) Pursuant to 40 CFR 63.1104(k), for purposes of TRE index value determinations, engineering assessments may be used to determine process vent flow rate, net heating value, TOC emission rate, and total organic HAP emission rate for the representative operating condition expected to yield the lowest TRE index value. Engineering assessments shall meet the requirements of 40 CFR 63.1104(k)(1) through 63.1104(k)(4). If a process vent flow rate or process vent organic HAP or TOC concentration is being determined for comparison with the applicable flow rate or concentration value presented in Table 5 or 6 of 40 CFR 63.1103(d) to determine control requirement applicability, engineering assessment may be used to determine the flow rate or concentration for the representative operating conditions expected to yield the highest flow rate or concentration.

(1) If the TRE index value calculated using such engineering assessment and the TRE index value equation in 40 CFR 63.1104(j) is greater than 4.0, then the Permittee is not required to perform the measurements specified in 40 CFR 63.1104(e) through 63.1104(i).

(2) If the TRE index value calculated using such engineering assessment and the TRE index value equation in 40 CFR 63.1104(j) is less than or equal to 4.0, then the Permittee is required either to perform the measurements specified in 40 CFR 63.1104(e) through 63.1104(i) for control applicability assessment or comply with the requirements (or standards) specified in Table 5 or 6 of 40 CFR 63.1103(d) (as applicable).

(3) Engineering assessment includes, but is not limited to, the examples specified in 40 CFR 63.1104(k)(3)(i) through 63.1104(k)(3)(iv):

(i) Previous test results, provided the tests are representative of current operating practices at the process unit.

(ii) Bench-scale or pilot-scale test data representative of the process under representative operating conditions.

(iii) Maximum flow rate, TOC emission rate, organic HAP emission rate, organic HAP or TOC concentration, or net heating value limit specified or implied within a permit limit applicable to the process vent.

(iv) Design analysis based on accepted chemical engineering principles, measurable process parameters, or physical or chemical laws or properties. Examples of analytical methods include, but are not limited to those specified in 40 CFR 63.1104(k)(3)(iv)(A) through 63.1104(k)(3)(iv)(D):

(A) Use of material balances based on process stoichiometry to estimate maximum TOC or organic HAP concentrations,

(B) Estimation of maximum flow rate based on physical equipment design such as pump or blower capacities,

(C) Estimation of TOC or organic HAP concentrations based on saturation conditions, and

(D) Estimation of maximum expected net heating value based on the stream concentration of each organic compound or, alternatively, as if all TOC in the stream were the compound with the highest heating value.

(4) All data, assumptions, and procedures used in the engineering assessment shall be documented. The Permittee shall maintain the records specified in 40 CFR 63.1104(l)(1) through 63.1104(l)(4), as applicable.

(l) [Applicable under DD.7]

(m) [Applicable under DD.7]

(n) Pursuant to 40 CFR 63.1104(n), parameter monitoring of certain process vents. A Permittee who maintains a TRE index value (if applicable) in the applicable TRE index value monitoring range as specified in an applicable table presented in 40 CFR 63.1103 without using a recovery device shall report a description of the parameter(s) to be monitored to ensure the process vent is operated in conformance with its design or process and achieves and maintains the TRE index value above the specified level, and an explanation of the criteria used to select parameter(s). A Permittee who maintains a TRE index value (if applicable) in the applicable TRE index monitoring range as specified in an applicable Table presented in 40 CFR 63.1103 by using a recovery device shall comply with the requirements of 40 CFR 63.993(c).

DD.5 Equipment leaks: applicability assessment procedures and methods: [326 IAC 14][40 CFR 63.1107 Subpart YY]

(a) Pursuant to 40 CFR 63.1107(a), each piece of equipment within a process unit that can reasonably be expected to contain equipment in organic HAP service is presumed to be in organic HAP service unless a Permittee demonstrates that the piece of equipment is not in organic HAP service. For a piece of equipment to be considered not in organic HAP service, it must be determined that the percent organic HAP content can be reasonably expected not to exceed the percent by weight control applicability criteria specified in 40 CFR 63.1103 for an affected source on an annual average basis. For purposes of determining the percent organic HAP content of the process fluid that is contained in or contacts equipment, Method 18 of 40 CFR Part 60, Appendix A shall be used.

(b) Pursuant to 40 CFR 63.1107(b), a Permittee may use good engineering judgment rather than the procedures in 40 CFR 63.1107(a) to determine that the percent organic HAP content does not exceed the percent by weight control applicability criteria specified in 40 CFR 63.1103 for an affected source. When a Permittee and IDEM, OAQ do not agree on whether a piece of equipment is not in organic HAP service, however, the procedures in 40 CFR 63.1107(a) shall be used to resolve the disagreement.

(c) Pursuant to 40 CFR 63.1107(c), if a Permittee determines that a piece of equipment is in organic HAP service, the determination can be revised after following the procedures in 40 CFR 63.1107(a), or by documenting that a change in the process or raw materials no longer causes the equipment to be in organic HAP service.

(d) Pursuant to 40 CFR 63.1107(d), samples used in determining the percent organic HAP content shall be representative of the process fluid that is contained in or contacts the equipment.

DD.6 Compliance with standards and operation and maintenance requirements: [326 IAC 14][40 CFR 63.1108 Subpart YY]

(a) Pursuant to 40 CFR 63.1108(a), the Permittee shall comply with the following requirements.

(1) Except as provided in 40 CFR 63.1108(a)(2), the emission limitations and established parameter ranges of 40 CFR Part 63 shall apply at all times except during periods of startup, shutdown, malfunction, or non-operation of the affected source (or specific portion thereof) resulting in cessation of the emissions to which 40 CFR Part 63, Subpart YY applies. During periods of startup, shutdown, or malfunction, the Permittee shall follow the applicable provisions of the startup, shutdown, malfunction plan required by 40 CFR 63.1111. However, if a startup, shutdown, malfunction or period of non-operation of one portion of an affected source does not affect the ability of a particular emission point to comply with the specific provisions to which it is subject, then that emission point shall still be required to comply with the applicable provisions of 40 CFR Part 63, Subpart YY and any of the Subparts that are referenced by Subpart YY during startup, shutdown, malfunction, or period of non-operation.

(2) If equipment leak requirements are referenced by 40 CFR Part 63, Subpart YY for a subject source category, such requirements shall apply at all times except during periods of startup, shutdown, or malfunction, process unit shutdown (as defined in 40 CFR 63.1101), or non-operation of the affected source (or specific portion thereof) in which the lines are drained and depressurized resulting in cessation of the emissions to which the equipment leak requirements apply.

(3) For batch unit operations, shutdown does not include the normal periods between batch cycles; and startup does not include the recharging of batch unit operations, or the transitional conditions due to changes in product.

(4) [Reserved]

(5) During startups, shutdowns, and malfunctions when the emission standards of 40 CFR Part 63, Subpart YY and the Subparts referenced by Subpart YY do not apply pursuant to 40 CFR 63.1108(a)(1) through 63.1108(a)(3), the Permittee shall implement, to the extent reasonably available, measures to prevent or minimize excess emissions. The measures to be taken shall be identified in the startup, shutdown, and malfunction plan (if applicable), and may include, but are not limited to, air pollution control technologies, recovery technologies, work practices, pollution prevention, monitoring, and/or changes in the manner of operation of the affected source. Back-up control devices are not required, but may be used if available. Compliance with an inadequate startup, shutdown, and malfunction plan developed pursuant to 40 CFR 63.1111 is not a shield for failing to comply with good operation and maintenance requirements.

(6) Malfunctions shall be corrected as soon as practical after their occurrence and/or in accordance with the source's startup, shutdown, and malfunction plan developed as specified under 40 CFR 63.1111.

(7) Operation and maintenance requirements established pursuant to Section 112 of the Clean Air Act are enforceable, independent of emissions limitations or other requirements in relevant standards.

(b) Pursuant to 40 CFR 63.1108(b) the Permittee shall comply with the following compliance assessment procedures.

(1) Parameter monitoring: compliance with operating conditions. Compliance with the required operating conditions for the monitored control devices or recovery devices may be determined by, but is not limited to, the parameter monitoring data for emission points that are required to perform continuous monitoring. For each excursion except for excused excursions (as described in 40 CFR 63.998(b)(6)(ii)), and as provided for in 40 CFR 63.1108(b)(2) the Permittee shall be deemed to have failed to have applied the control in a manner that achieves the required operating conditions.

(2) Parameter monitoring: Excursions. An excursion is not a violation in cases where continuous monitoring is required and the excursion does not count toward the number of excused excursions (as described in 40 CFR 63.998(b)(6)(ii)), if the conditions of 40 CFR 63.1108(b)(2)(i) or 63.1108(b)(2)(ii) are met. Nothing in 40 CFR 63.1108(b)(2) shall be construed to allow or excuse a monitoring parameter excursion caused by any activity that violates other applicable provisions of 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY.

(i) During periods of startup, shutdown, or malfunction (and the source is operated during such periods in accordance with the source's startup, shutdown, and malfunction plan as required by 40 CFR 63.1111), or

(ii) During periods of non-operation of the affected source or portion thereof (resulting in cessation of the emissions to which the monitoring applies).

(3) Operation and maintenance procedures. Determination of whether acceptable operation and maintenance procedures are being used will be based on information available to IDEM, OAQ. This information may include, but is not limited to, monitoring results, review of operation and maintenance procedures (including the startup, shutdown, and malfunction plan under 40 CFR 63.1111), review of operation and maintenance records, and inspection of the affected source.

(4) Applicability and compliance assessment procedures. Applicability and compliance with standards shall be governed by, in part, but not limited to, the use of data, tests, and requirements according to 40 CFR 63.1108(b)(4)(i) through 63.1108(b)(4)(iii). Compliance with design, equipment, work practice, and operating standards, including those for equipment leaks, shall be determined according to 40 CFR 63.1108(b)(5).

(i) Applicability assessments. Unless otherwise specified in a relevant test method required to assess control applicability, each test shall consist of three separate runs using the applicable test method. Each run shall be conducted for the time and under the conditions specified in 40 CFR Part 63, Subpart YY. The arithmetic mean of the results of the three runs shall apply when assessing applicability. Upon receiving approval from IDEM, OAQ, results of a test run may be replaced with results of an additional test run if it meets the criteria specified in 40 CFR 63.1108(b)(4)(i)(A) through 63.1108(b)(4)(i)(D).

(A) A sample is accidentally lost after the testing team leaves the site; or

(B) Conditions occur in which one of the three runs must be discontinued because of forced shutdown; or

(C) Extreme meteorological conditions occur;

(D) Other circumstances occur that are beyond the Permittee's control.

(ii) Performance test. IDEM, OAQ may determine compliance with emission limitations of 40 CFR Part 63, Subpart YY based on, but not limited to, the results of performance tests conducted according to the procedures specified in 40 CFR 63.997, unless otherwise specified in 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY.

(iii) Operation and maintenance requirements. IDEM, OAQ may determine compliance with the operation and maintenance standards of 40 CFR Part 63, Subpart YY by, but not limited to, evaluation of the Permittee conformance with operation and maintenance requirements, including the evaluation of monitoring data, as specified in 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY.

(5) Design, equipment, work practice, or operational standards. IDEM, OAQ may determine compliance with design, equipment, work practice, or operational requirements by, but is not limited to, review of records, inspection of the affected source, and by evaluation of a Permittee's conformance with operation and maintenance requirements as specified in 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY.

(c) [Reserved]

(d) [Reserved]

Recordkeeping and Reporting Requirements

DD.7 Process vents from continuous unit operations: applicability assessment procedures and methods: [326 IAC 14][40 CFR 63.1104 Subpart YY]

(a) [Applicable under DD.4]

(b) [Applicable under DD.4]

(c) [Applicable under DD.4]

(d) [Reserved]

(e) [Applicable under DD.4]

(f) [Applicable under DD.4]

(g) [Applicable under DD.4]

(h) [Applicable under DD.4]

(i) [Applicable under DD.4]

(j) [Applicable under DD.4]

(k) [Applicable under DD.4]

(l) Pursuant to 40 CFR 63.1104(l), applicability assessment recordkeeping requirements.

(1) TRE index value records. The Permittee shall maintain records of measurements, engineering assessments, and calculations performed to determine the TRE index value of the process vent according to the procedures of 40 CFR 63.1104(j), including those records associated with halogen vent stream determination. Documentation of engineering assessments shall include all data, assumptions, and procedures used for the engineering assessments, as specified in 40 CFR 63.1104(k). As specified in 40 CFR 63.1104(m), the Permittee shall include this information in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(2) Flow rate records. The Permittee shall record the flow rate as measured using the sampling site and flow rate determination procedures (if applicable) specified in 40 CFR 63.1104(b) and 63.1104(f) or determined through engineering assessment as specified in 40 CFR 63.1104(k). As specified in 40 CFR 63.1104(m), the Permittee shall include this information in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(3) Concentration records. The Permittee shall record the regulated organic HAP or TOC concentration (if applicable) as measured using the sampling site and regulated organic HAP or TOC concentration determination procedures specified in 40 CFR 63.1104(e)(1) and 63.1104(e)(2), or determined through engineering assessment as specified in 40 CFR 63.1104(k). As specified in 40 CFR 63.1104(m), the Permittee shall include this information in the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4).

(4) Process change records. The Permittee shall keep up-to-date, readily accessible records of any process changes that change the control applicability for a process vent. Records are to include any recalculation or measurement of the flow rate, regulated organic HAP or TOC concentration, and TRE index value.

(m) Pursuant to 40 CFR 63.1104(m), applicability assessment reporting requirements.

(1) Notification of Compliance Status. The Permittee shall submit, as part of the Notification of Compliance Status report required by 40 CFR 63.1110(a)(4), the information recorded in 40 CFR 63.1104(l)(1) through 63.1104(l)(3).

(2) Process change.

(i) Whenever a process vent becomes subject to control requirements under 40 CFR Part 63, Subpart YY as a result of a process change, the Permittee shall submit a report within 60 days after the performance test or applicability assessment, whichever is sooner. The report may be submitted as part of the next Periodic Report required by 40 CFR 63.1110(a)(5). The report shall include the information specified in 40 CFR 63.1104(m)(2)(i)(A) through 63.1104(m)(2)(i)(C).

(A) A description of the process change;

(B) The results of the recalculation of the TOC or organic HAP concentration, flow rate, and/or TRE index value required under 40 CFR 63.1104(e), 63.1104(f), and 63.1104(j), and recorded under 40 CFR 63.1104(l); and

(C) A statement that the Permittee will comply with the requirements specified in 40 CFR 63.1103 by the schedules specified in those section for the affected source.

(ii) If a performance test is required as a result of a process change, the Permittee shall specify that the performance test has become necessary due to a process change. This specification shall be made in the performance test notification to IDEM, OAQ, as specified in 40 CFR 63.999(a)(1).

(iii) If a process change does not result in additional applicable requirements, then the Permittee shall include a statement documenting this in the next Periodic Report required by 40 CFR 63.1110(a)(5) after the process change was made.

(n) [Applicable under DD.4]

DD.8 Recordkeeping requirements: [326 IAC 14][40 CFR 63.1109 Subpart YY]

(a) Pursuant to 40 CFR 63.1109(a), the Permittee shall maintain notifications, records, and reports. The Permittee of each affected source subject to 40 CFR Part 63, Subpart YY shall keep copies of notifications, reports and records required by Subpart YY and Subparts referenced by Subpart YY for at least 5 years, unless otherwise specified under 40 CFR Part 63, Subpart YY.

(b) [Reserved]

(c) Pursuant to 40 CFR 63.1109(c), all records required to be maintained by 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY shall be maintained in such a manner that they can be readily accessed and are suitable for inspection. The records of the remaining 3 years, where required, may be retained offsite. Records may be maintained in hard copy or computer-readable form including, but not limited to, on paper, microfilm, computer, computer disk, magnetic tape, or microfiche.

(d) Pursuant to 40 CFR 63.1109(d), control applicability records; The Permittee shall maintain records containing information developed and used to assess control applicability under 40 CFR 63.1103(d) (e.g., combined total annual emissions of regulated organic HAP).

DD.9 Reporting requirements: [326 IAC 14][40 CFR 63.1110 Subpart YY]

(a) Pursuant to 40 CFR 63.1110(a), required reports; The Permittee of an affected source subject to 40 CFR Part 63, Subpart YY shall submit the reports listed in 40 CFR 63.1110(a)(1) through 63.1110(a)(8), as applicable.

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) Periodic Reports described in 40 CFR 63.1110(e).

(6) Application for approval of construction or reconstruction described in 40 CFR 63.5(d) of Subpart A.

(7) Startup, Shutdown, and Malfunction Reports described in 40 CFR 63.1111.

(8) Other reports. Other reports shall be submitted as specified elsewhere in 40 CFR Part 63, Subpart YY and Subparts referenced by Subpart YY.

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) Pursuant to 40 CFR 63.1110(e), periodic reports; The Permittee of an affected source subject to monitoring requirements of 40 CFR Part 63, Subpart YY, or to other requirements of Subpart YY or Subparts referenced by 40 CFR Part 63, Subpart YY, where periodic reporting is specified, shall submit a Periodic Report.

(1) Contents. Periodic Reports shall include all information specified in 40 CFR Part 63, Subpart YY and Subparts referenced by Subpart YY.

(2) Due date. The Periodic Report shall be submitted no later than 60 days after the end of each 6-month period.

(3) Overlap with Title V reports. Information required by 40 CFR Part 63, Subpart YY, which is submitted with a Title V periodic report, need not also be included in a subsequent Periodic Report required by 40 CFR Part 63, Subpart YY or Subpart referenced by Subpart YY. The Title V report shall be referenced in the Periodic Report required by 40 CFR Part 63, Subpart YY.

(f) Pursuant to 40 CFR 63.1110(f), general report content; All reports and notifications submitted pursuant to 40 CFR Part 63, Subpart YY, including reports that combine information required under Subpart YY and a Subpart referenced by 40 CFR Part 63, Subpart YY, shall include the information specified in 40 CFR 63.1110(f)(1) through 63.1110(f)(4).

(1) The name, address and telephone number (fax number may also be provided) of the Permittee.

(2) The name, address and telephone number of the person to whom inquiries should be addressed, if different than the Permittee.

(3) The address (physical location) of the reporting facility.

(4) Identification of each affected source covered in the submission and identification of the Subparts (40 CFR Part 63, Subpart YY and the Subparts referenced in Subpart YY) that are applicable to that affected source. Summaries and groupings of this information are permitted.

(g) Pursuant to 40 CFR 63.1110(g), the Permittee shall submit reports and notification in adherence with the following specifications.

(1) Submission to the Environmental Protection Agency. All reports and notifications required under 40 CFR Part 63, Subpart YY shall be sent to the appropriate EPA Regional Office and to IDEM OAQ. The EPA Regional Office may waive the requirement to submit a copy of any reports or notifications at its discretion.

(2) Submission of copies. If IDEM, OAQ requires a notice that contains all the information required in a report or notification listed in 40 CFR Part 63, Subpart YY, a Permittee may send the appropriate EPA Regional Office a copy of the report or notification sent to IDEM OAQ to satisfy the requirements of 40 CFR Part 63, Subpart YY for that report or notification.

(3) Method of submission. Wherever 40 CFR Part 63, Subpart YY specifies “postmark” dates, submittals may be sent by methods other than the U.S. Mail (e.g., by fax or courier). Submittals shall be sent on or before the specified date.

(4) Submission by electronic media. If acceptable to both the US. EPA, IDEM OAQ, and the Permittee of an affected source, reports may be submitted on electronic media.

(h) [Reserved]

DD.10 Startup, shutdown, and malfunction: [326 IAC 14][40 CFR 63.1111 Subpart YY]

(a) Pursuant to 40 CFR 63.1111(a), startup, shutdown, and malfunction plan will shall meet the following criteria.

(1) Description and purpose of plan. The Permittee of an affected source shall develop and implement a written startup, shutdown, and malfunction plan that describes, in detail, procedures for operating and maintaining the affected source during periods of startup, shutdown, and malfunction. This plan shall also include a program of corrective action for malfunctioning process and air pollution control equipment used to comply with relevant standards under 40 CFR Part 63, Subpart YY. The plan shall also address routine or otherwise predictable CPMS malfunctions. This plan shall be developed by the Permittee by the affected source's compliance date under 40 CFR Part 63, Subpart YY. The requirement to develop and implement this plan shall be incorporated into the source's Title V permit. This requirement is optional for equipment that must comply with Subparts TT or UU under 40 CFR Part 63, Subpart YY. It is not optional for equipment equipped with a closed vent system and control device subject to 40 CFR Part 63, Subpart YY and Part 63, Subpart SS. The purpose of the startup, shutdown, and malfunction plan is described in 40 CFR 63.1111(a)(1)(i) and 63.1111(a)(1)(ii).

(i) To ensure that the Permittee is prepared to correct malfunctions as soon as practical after their occurrence, in order to minimize excess emissions of regulated organic HAP; and

(ii) To reduce the reporting burden associated with periods of startup, shutdown, and malfunction (including corrective action taken to restore malfunctioning process and air pollution control equipment to its normal or usual manner of operation).

(2) Operation of source. During periods of startup, shutdown, and malfunction, the Permittee of an affected source subject to 40 CFR Part 63, Subpart YY shall operate and maintain such affected source (including associated air pollution control equipment and CPMS) in accordance with the procedures specified in the startup, shutdown, and malfunction plan developed under 40 CFR 63.1111(a)(1).

(3) Use of additional procedures. To satisfy the requirements of 40 CFR 63.1111 to develop a startup, shutdown, and malfunction plan, the Permittee of an affected source may use the affected source's standard operating procedures (SOP) manual, or an Occupational Safety and Health Administration (OSHA) or other plan, provided the alternative plans meet all the requirements of 40 CFR 63.1111 and are made available for inspection when requested by IDEM, OAQ.

(4) Revisions to the plan. Based on the results of a determination made under 40 CFR 63.1108(b)(3); IDEM, OAQ may require that a Permittee of an affected source make changes to the startup, shutdown, and malfunction plan for that source. IDEM, OAQ may require reasonable revisions to a startup, shutdown, and malfunction plan if IDEM, OAQ finds that the plan is inadequate as specified in 40 CFR 63.1111(a)(4)(i) through 63.1111(a)(4)(iv):

(i) Does not address a startup, shutdown, and malfunction event of the CPMS, the air pollution control equipment, or the affected source that has occurred; or

(ii) Fails to provide for the operation of the affected source (including associated air pollution control equipment and CPMS) during a startup, shutdown, and malfunction event in a manner consistent with good air pollution control practices for minimizing emissions to the extent practical; or

(iii) Does not provide adequate procedures for correcting malfunctioning process and air pollution control equipment as quickly as practicable; or

(iv) Does not provide adequate measures to prevent or minimize excess emissions to the extent practical as specified in 40 CFR 63.1108(a)(5).

(5) Additional malfunction plan requirements. If the startup, shutdown, and malfunction plan fails to address or inadequately addresses an event that meets the characteristics of a malfunction but was not included in the startup, shutdown, and malfunction plan at the time the Permittee developed the plan, the Permittee shall revise the startup, shutdown, and malfunction plan within 45 days after the event to include detailed procedures for operating and maintaining the affected source during similar malfunction events and a program of corrective action for similar malfunctions of process or air pollution control equipment or CPMS.

(b) Pursuant to 40 CFR 63.1111(b), startup, shutdown, and malfunction reporting shall meet the following requirements.

(1) Periodic startup, shutdown, and malfunction reporting requirements. If actions taken by a Permittee during a startup, shutdown, and malfunction of an affected source, or of a control device or monitoring system required for compliance (including actions taken to correct a malfunction) are consistent with the procedures specified in the affected source's plan, then the Permittee shall state such information in a startup, shutdown, and malfunction report. During the reporting period, reports shall only be required for startups, shutdowns, and malfunctions during which excess emissions, as defined in 40 CFR 63.1108(a)(5), occur during the reporting period. A startup, shutdown, and malfunction report can be submitted as part of a Periodic Report required under 40 CFR 63.1110(a)(5), or on a more frequent basis if specified otherwise under 40 CFR Part 63, Subpart YY or a Subpart referenced by Subpart YY or as established otherwise by IDEM, OAQ in the affected source's title V permit. The startup, shutdown, and malfunction report shall be delivered or postmarked by the 30th day following the end of each calendar half (or other calendar reporting period, as appropriate), unless the information is submitted with the Periodic Report. The report shall include the information specified in 40 CFR 63.1111(b)(1)(i) through 63.1111(b)(1)(iv).

(i) The name, title, and signature of the Permittee or other responsible official certifying its accuracy.

(ii) The number of startup, shutdown, and malfunction events and the total duration of all periods of startup, shutdown, and malfunction for the reporting period if the total duration amounts to either of the durations in 40 CFR 63.1111(b)(1)(ii)(A) or 63.1111(b)(1)(ii)(B). Records of the number of CPMS startup, shutdown, and malfunction events and the total duration of all periods of startup, shutdown, and malfunction for the reporting period are required under 40 CFR 63.998(c)(1)(ii)(C) and 63.998(c)(1)(ii)(D).

(A) Total duration of periods of malfunctioning of a CPMS equal to or greater than 5 percent of that CPMS operating time for the reporting period; or

(B) Total duration of periods of startup, shutdown, and malfunction for an affected source equal to or greater than 1 percent of that affected source's operating time for the reporting period.

(iii) Records documenting each startup, shutdown and malfunction event as required under 40 CFR 63.998(c)(1)(ii)(F).

(iv) Records documenting the total duration of operating time as required under 40 CFR 63.998(c)(1)(ii)(H).

(2) Immediate startup, shutdown, and malfunction reports. Notwithstanding the allowance to reduce the frequency of reporting for startup, shutdown, and malfunction reports under 40 CFR 63.1111(b)(1), any time an action taken by a Permittee during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) during which excess emissions occur is not consistent with the procedures specified in the affected source's plan, the Permittee shall report the actions taken for that event within 2 working days after commencing actions inconsistent with the plan, followed by a letter delivered or postmarked within 7 working days after the end of the event. The immediate report required under 40 CFR 63.1111(b)(2) shall contain the name, title, and signature of the Permittee or other responsible official who is certifying its accuracy, explaining the circumstances of the event, the reasons for not following the startup, shutdown, and malfunction plan, and whether any excess emissions and/or parameter monitoring exceedances are believed to have occurred. Notwithstanding the requirements of the previous sentence, after the effective date of an approved permit program in the State in which an affected source is located, the Permittee may make alternative reporting arrangements, in advance, with IDEM, OAQ. Procedures governing the arrangement of alternative reporting requirements under 40 CFR 63.1111(b)(2) are specified in 40 CFR 63.1110(h).

(3) [Reserved]

SECTION EE 40 CFR Part 63, Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process

Definitions contained in 40 CFR Part 63, Subpart SS, Section 981 are applicable to the Permittee.

Emissions Limitations and Standards

EE.1 Requirements: [326 IAC 14][40 CFR 63.982 Subpart SS]

(a) Pursuant to 40 CFR 63.982(a), the Permittee who is referred to 40 CFR Part 63, Subpart SS for controlling regulated material emissions from storage vessels, process vents, or equipment leaks by venting emissions through a closed vent system to a nonflare control device or routing to a process shall comply with the applicable requirements of 40 CFR 63.982(a)(1) through 63.982(a)(4).

(1) Storage vessels. The Permittee shall comply with the applicable provisions of 40 CFR 63.982(d).

(2) Process vents. The Permittee shall comply with the applicable provisions of 40 CFR 63.982(c)(2), and 63.982(e).

(3) [Reserved]

(4) Equipment leaks. The Permittee shall comply with the applicable provisions of 40 CFR 63.982(c)(3).

(b) [Reserved]

(c) Pursuant to 40 CFR 63.982(c), Permittee who control emissions through a closed vent system to a nonflare control device shall meet the requirements in 40 CFR 63.983 for closed vent systems, the applicable recordkeeping and reporting requirements of 40 CFR 63.998 and 63.999, and the applicable requirements listed below.

(1) [Reserved]

(2) For process vents, the Permittee shall meet the requirements applicable to the control devices being used in 40 CFR 63.990; the applicable general monitoring requirements of 40 CFR 63.996 and the applicable performance test requirements and procedures of 40 CFR 63.997; and the monitoring, recordkeeping and reporting requirements referenced therein. The Permittee subject to halogen reduction device requirements under a referencing subpart must also comply with 40 CFR 63.994 and the monitoring, recordkeeping, and reporting requirements referenced therein. The requirements of 40 CFR 63.984 through 63.986 do not apply to process vents or high throughput transfer racks.

(3) For equipment leaks, the Permittee shall meet the requirements in 40 CFR 63.986 for nonflare control devices used for equipment leak emissions and the monitoring, recordkeeping, and reporting requirements referenced therein. No other provisions of 40 CFR Part 63, Subpart SS shall apply to equipment leak emissions vented through a closed vent system to a nonflare control device.

(d) Pursuant to 40 CFR 63.982(d), the Permittee that routes emissions to a process shall meet the requirements in 40 CFR 63.984, the monitoring, recordkeeping, and reporting requirements referenced therein, and the applicable recordkeeping and reporting requirements of 40 CFR 63.998 and 63.999. No other provisions of 40 CFR Part 63, Subpart SS apply to emissions being routed to a process.

(e) Pursuant to 40 CFR 63.982(e), the Permittee that uses a final recovery device to maintain a TRE above a level specified in a referencing subpart shall meet the requirements in 40 CFR 63.993 and the monitoring, recordkeeping, and reporting requirements referenced therein that are applicable to the recovery device being used; the applicable monitoring requirements in 40 CFR 63.996 and the recordkeeping and reporting requirements referenced therein; and the applicable recordkeeping and reporting requirements of 40 CFR 63.998 and 63.999. No other provisions of this subpart apply to process vent emissions routed to a final recovery device.

(f) [Reserved]

EE.2 Closed vent systems: [326 IAC 14][40 CFR 63.983 Subpart SS]

(a) Pursuant to 40 CFR 63.983(a), except for closed vent systems operated and maintained under negative pressure, the provisions of 40 CFR 63.983(a) apply to closed vent systems collecting regulated material from a regulated source.

(1) Collection of emissions. Each closed vent system shall be designed and operated to collect the regulated material vapors from the emission point, and to route the collected vapors to a control device.

(2) Period of operation. Closed vent systems used to comply with the provisions of 40 CFR 63, Subpart SS shall be operated at all times when emissions are vented to, or collected by, them.

(3) Bypass monitoring. Except for equipment needed for safety purposes such as pressure relief devices, low leg drains, high point bleeds, analyzer vents, and open-ended valves or lines, the Permittee shall comply with the provisions of either 40 CFR 63.983(a)(3)(i) or (ii) for each closed vent system that contains bypass lines that could divert a vent stream to the atmosphere.

(i) Properly install, maintain, and operate a flow indicator that is capable of taking periodic readings. Records shall be generated as specified in §63.998(d)(1)(ii)(A). The flow indicator shall be installed at the entrance to any bypass line.

(ii) Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Records shall be generated as specified in §63.998(d)(1)(ii)(B).

(4) [Reserved]

(5) [Reserved]

(b) Pursuant to 40 CFR 63.982(b), the provisions of 40 CFR 63.982(b) apply to closed vent systems collecting regulated material from a regulated source. Inspection records shall be generated as specified in 40 CFR 63.998(d)(1)(iii) and (iv).

(1) Except for any closed vent systems that are designated as unsafe or difficult to inspect as provided in 40 CFR 63.983(b)(2) and (3), each closed vent system shall be inspected as specified in 40 CFR 63.983(b)(1)(i) or (ii).

(i) If the closed vent system is constructed of hard-piping, the Permittee shall comply with the requirements specified in 40 CFR 63.983(b)(1)(i)(A) and (B).

(A) Conduct an initial inspection according to the procedures in 40 CFR 63.983(c); and

(B) Conduct annual inspections for visible, audible, or olfactory indications of leaks.

(ii) If the closed vent system is constructed of ductwork, the Permittee shall conduct an initial and annual inspection according to the procedures in 40 CFR 63.983(c).

(2) Any parts of the closed vent system that are designated, as described in 40 CFR63.998(d)(1)(i), as unsafe to inspect are exempt from the inspection requirements of 40 CFR 63.983(b)(1) if the conditions of 40 CFR 63.983(b)(2)(i) and (ii) are met.

(i) The Permittee determines that the equipment is unsafe-to-inspect because inspecting personnel would be exposed to an imminent or potential danger as a consequence of complying with 40 CFR 63.983(b)(1); and

(ii) The Permittee has a written plan that requires inspection of the equipment as frequently as practical during safe-to-inspect times. Inspection is not required more than once annually.

(3) Any parts of the closed vent system that are designated, as described in 40 CFR 63.998(d)(1)(i), as difficult-to-inspect are exempt from the inspection requirements of 40 CFR 63.983(b)(1) if the provisions of 40 CFR 63.983(b)(3)(i) and (ii) apply.

(i) The Permittee determines that the equipment cannot be inspected without elevating the inspecting personnel more than 2 meters (7 feet) above a support surface; and

(ii) The Permittee has a written plan that requires inspection of the equipment at least once every 5 years.

(4) For each bypass line, the Permittee shall comply with 40 CFR 64.983(b)(4)(i) or (ii).

(i) If a flow indicator is used, take a reading at least once every 15 minutes.

(ii) If the bypass line valve is secured in the non-diverting position, visually inspect the seal or closure mechanism at least once every month to verify that the valve is maintained in the non-diverting position, and the vent stream is not diverted through the bypass line.

(c) Pursuant to 40 CFR 63.983(c), the provisions of 40 CFR 63.983(c) apply to closed vent systems collecting regulated material from a regulated source.

(1) Each closed vent system subject to 40 CFR 63.983(c) shall be inspected according to the procedures specified in 40 CFR 63.983(c)(1)(i) through (vii).

(i) Inspections shall be conducted in accordance with Method 21 of 40 CFR part 60, appendix A, except as specified 40 CFR 63.983(c).

(ii) Except as provided in 40 CFR 63.983(c)(1)(iii), the detection instrument shall meet the performance criteria of Method 21 of 40 CFR part 60, appendix A, except the instrument response factor criteria in section 3.1.2(a) of Method 21 must be for the representative composition of the process fluid and not of each individual VOC in the stream. For process streams that contain nitrogen, air, water, or other inerts that are not

organic HAP or VOC, the representative stream response factor must be determined on an inert-free basis. The response factor may be determined at any concentration for which the monitoring for leaks will be conducted.

(iii) If no instrument is available at the plant site that will meet the performance criteria of Method 21 specified in 40 CFR 63.983(c)(1)(ii), the instrument readings may be adjusted by multiplying by the representative response factor of the process fluid, calculated on an inert-free basis as described in 40 CFR 63.983(c)(1)(ii).

(iv) The detection instrument shall be calibrated before use on each day of its use by the procedures specified in Method 21 of 40 CFR part 60, appendix A.

(v) Calibration gases shall be as specified in 40 CFR 63.983(c)(1)(v)(A) through (C).

(A) Zero air (less than 10 parts per million hydrocarbon in air); and

(B) Mixtures of methane in air at a concentration less than 10,000 parts per million. A calibration gas other than methane in air may be used if the instrument does not respond to methane or if the instrument does not meet the performance criteria specified in 40 CFR 63.983(c)(1)(ii). In such cases, the calibration gas may be a mixture of one or more of the compounds to be measured in air.

(C) If the detection instrument's design allows for multiple calibration scales, then the lower scale shall be calibrated with a calibration gas that is no higher than 2,500 parts per million.

(vi) The Permittee may elect to adjust or not adjust instrument readings for background. If an owner or operator elects not to adjust readings for background, all such instrument readings shall be compared directly to 500 parts per million to determine whether there is a leak. If the Permittee elects to adjust instrument readings for background, the Permittee shall measure background concentration using the procedures in this section. The Permittee shall subtract the background reading from the maximum concentration indicated by the instrument.

(vii) If the Permittee elects to adjust for background, the arithmetic difference between the maximum concentration indicated by the instrument and the background level shall be compared with 500 parts per million for determining whether there is a leak.

(2) The instrument probe shall be traversed around all potential leak interfaces as described in Method 21 of 40 CFR part 60, appendix A.

(3) Except as provided in 40 CFR 63.983(c)(4), inspections shall be performed when the equipment is in regulated material service, or in use with any other detectable gas or vapor.

(4) [Reserved]

(d) Pursuant to 40 CFR 63.983(d), the provisions of 40 CFR 63.983(d) apply to closed vent systems collecting regulated material from a regulated source.

(1) If there are visible, audible, or olfactory indications of leaks at the time of the annual visual inspections required by 40 CFR 63.983(b)(1)(i)(B), the Permittee shall follow the procedure specified in either 40 CFR 63.983(d)(1)(i) or (ii).

(i) The Permittee shall eliminate the leak.

(ii) The Permittee shall monitor the equipment according to the procedures in 40 CFR 63.983(c).

(2) Leaks, as indicated by an instrument reading greater than 500 parts per million by volume above background or by visual inspections, shall be repaired as soon as practical, except as provided in 40 CFR 63.983(d)(3). Records shall be generated as specified in 40 CFR 63.998(d)(1)(iii) when a leak is detected.

(i) A first attempt at repair shall be made no later than 5 days after the leak is detected.

(ii) Except as provided in 40 CFR 63.983(d)(3), repairs shall be completed no later than 15 days after the leak is detected or at the beginning of the next introduction of vapors to the system, whichever is later.

(3) Delay of repair of a closed vent system for which leaks have been detected is allowed if repair within 15 days after a leak is detected is technically infeasible or unsafe without a closed vent system shutdown, as defined in 40 CFR 63.981, or if the Permittee determines that emissions resulting from immediate repair would be greater than the emissions likely to result from delay of repair. Repair of such equipment shall be completed as soon as practical, but not later than the end of the next closed vent system shutdown.

EE.3 Fuel gas systems and processes to which storage vessel, transfer rack, or equipment leak regulated material emissions are routed: [326 IAC 14][40 CFR 63.984 Subpart SS]

(a) Pursuant to 40 CFR 63.984(a), equipment and operating requirements for processes shall meet the following specifications.

(1) Except during periods of start-up, shutdown and malfunction as specified in the referencing subpart, the process shall be operating at all times when regulated material emissions are routed to it.

(2) [Reserved]

(b) Pursuant to 40 CFR 63.984(b), the process compliance shall be assessed as follows:

(1) [Reserved]

(2) If emissions are routed to a process, the regulated material in the emissions shall meet one or more of the conditions specified in 40 CFR 63.984(b)(2)(i) through 63.984(b)(2)(iv). The Permittee of storage vessels subject to 40 CFR 63.984(b)(2) shall comply with the compliance demonstration requirements in 40 CFR 63.984(b)(3).

(i) Recycled and/or consumed in the same manner as a material that fulfills the same function in that process;

(ii) Transformed by chemical reaction into materials that are not regulated materials;

(iii) Incorporated into a product; and/or

(iv) Recovered.

(3) To demonstrate compliance with 40 CFR 63.984(b)(2) for a storage vessel, the Permittee shall prepare a design evaluation (or engineering assessment) that demonstrates the extent to which one or more of the conditions specified in 40 CFR 63.984(b)(2)(i) through 63.984(b)(2)(iv) are being met.

(c) [Reserved]

EE.4 Nonflare control devices used for equipment leaks only:
[326 IAC 14][40 CFR 63.986 Subpart SS]

(a) Pursuant to 40 CFR 63.986(a), nonflare control devices shall meet the following equipment and operating requirements.

(1) The Permittee using a nonflare control device to meet the applicable requirements of a referencing subpart for equipment leaks shall meet the requirements of 40 CFR 63.986.

(2) Control devices used to comply with the provisions of 40 CFR Part 63, Subpart SS shall be operated at all times when emissions are vented to them.

(b) Pursuant to 40 CFR 63.986(b), a performance test is not required for any nonflare control device used only to control emissions from equipment leaks.

(c) Pursuant to 40 CFR 63.986(c), control devices that are used to comply only with the provisions of a referencing subpart for control of equipment leak emissions shall monitor these control devices to ensure that they are operated and maintained in conformance with their design. The Permittee shall maintain the records as specified in 40 CFR 63.998(d)(4).

EE.5 Absorbers, condensers, and carbon adsorbers used as control devices:
[326 IAC 14][40 CFR 63.990 Subpart SS]

(a) Pursuant to 40 CFR 63.990(a), absorbers, shall meet the following equipment and operations requirements:

(1) The Permittee using absorbers, to meet a weight-percent emission reduction or parts per million by volume outlet concentration requirement specified in a referencing subpart shall meet the requirements of 40 CFR 63.990.

(2) Absorbers, used to comply with the provisions of a referencing subpart and 40 CFR Part 63, Subpart SS shall be operated at all times when emissions are vented to them.

(b) [Applicable under EE.9]

(c) [Reserved because GE uses an alternative monitoring parameter for process vent F-972]

EE.6 Absorbers, condensers, carbon adsorbers and other recovery devices used as final recovery devices: [326 IAC 14][40 CFR 63.993 Subpart SS]

(a) Pursuant to 40 CFR 63.993(a)(1), a Permittee using a final recovery device to maintain a TRE above a level specified in a referencing subpart shall meet the requirements of this section.

(2) Recovery devices used to comply with the provisions of a referencing subpart and 40 CFR 63, Subpart SS shall be operated at all times when emissions are vented to them.

(b) [Reserved]

(c) Pursuant to 40 CFR 63.993(c), The Permittee shall meet the following recovery device monitoring requirements.

(1) Where an absorber is the final recovery device in the recovery system and the TRE index value is between the level specified in a referencing subpart and 4.0, either an organic monitoring device capable of providing a continuous record or a scrubbing liquid temperature monitoring device and a specific gravity monitoring device, each capable of providing a continuous record, shall be used. If the difference between the specific gravity of the saturated scrubbing fluid and specific gravity of the fresh scrubbing fluid is less than 0.02 specific gravity units, an organic monitoring device capable of providing a continuous record shall be used. Monitoring results shall be recorded as specified in 40 CFR 63.998(b) and 63.998(c), as applicable. General requirements for monitoring and continuous parameter monitoring systems are contained in 40 CFR 63.996.

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

EE.7 Halogen scrubbers and other halogen reduction devices:
[326 IAC 14][40 CFR 63.994 Subpart SS]

(a) Pursuant to 40 CFR 63.994(a)(1), the Permittee of a halogen scrubber or other halogen reduction device subject to 40 CFR Part 63, Subpart SS shall reduce the overall emissions of hydrogen halides and halogens by the control device performance level specified in a referencing subpart.

(2) Halogen scrubbers and other halogen reduction devices used to comply with the provisions of a referencing subpart and 40 CFR Part 63, Subpart SS shall be operated at all times when emissions are vented to them.

(b) [Applicable under EE.10]

(c) [Reserved because GE uses an alternative monitoring parameter for F-972]

EE.8 General monitoring requirements for control and recovery devices:
[326 IAC 14][40 CFR 63.996 Subpart SS]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.996(b), the Permittee shall conduct monitoring as follows:

(1) Monitoring shall be conducted as set forth in 40 CFR 63.996 and in the relevant sections of 40 CFR Part 63, Subpart SS unless the provision in either 40 CFR 63.996(b)(1)(i) or 63.996(b)(1)(ii) applies.

(i) IDEM, OAQ specifies or approves the use of minor changes in methodology for the specified monitoring requirements and procedures; or

(ii) IDEM, OAQ approves the use of alternatives to any monitoring requirements or procedures as provided in the referencing subpart 40 CFR 63.996(d).

(2) When one CPMS is used as a backup to another CPMS, the Permittee shall report the results from the CPMS used to meet the monitoring requirements of 40 CFR Part 63, Subpart SS. If both such CPMS's are used during a particular

reporting period to meet the monitoring requirements of 40 CFR Part 63, Subpart SS, then the Permittee shall report the results from each CPMS for the time during the six month period that the instrument was relied upon to demonstrate compliance.

(c) Pursuant to 40 CFR 63.996(c), the Permittee shall operate and maintain continuous parameter monitoring systems as follows:

(1) All monitoring equipment shall be installed, calibrated, maintained, and operated according to manufacturer's specifications or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

(2) The Permittee of a regulated source shall maintain and operate each CPMS as specified in 40 CFR 63.996, or in a relevant subpart, and in a manner consistent with good air pollution control practices.

(i) The Permittee of a regulated source shall ensure the immediate repair or replacement of CPMS parts to correct “routine” or otherwise predictable CPMS malfunctions. The necessary parts for routine repairs of the affected equipment shall be readily available.

(ii) If under the referencing subpart, the Permittee has developed a start-up, shutdown, and malfunction plan, the plan is followed, and the CPMS is repaired immediately, this action shall be recorded as specified in 40 CFR 63.998(c)(1)(ii)(E).

(iii) IDEM, OAQ's determination of whether acceptable operation and maintenance procedures are being used for the CPMS will be based on information that may include, but is not limited to, review of operation and maintenance procedures, operation and maintenance records as specified in 40 CFR 63.998(c)(1)(i) and 63.998(c)(1)(ii), manufacturer's recommendations and specifications, and inspection of the CPMS.

(3) All CPMS's shall be installed and operational, and the data verified as specified in 40 CFR Part 63, Subpart SS either prior to or in conjunction with conducting performance tests. Verification of operational status shall, at a minimum, include completion of the manufacturer's written specifications or recommendations for installation, operation, and calibration of the system or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

(4) All CPMS's shall be installed such that representative measurements of parameters from the regulated source are obtained.

(5) In accordance with the referencing subpart, except for system breakdowns, repairs, maintenance periods, instrument adjustments, or checks to maintain precision and accuracy, calibration checks, and zero and span adjustments, all continuous parameter monitoring systems shall be in continuous operation when emissions are being routed to the monitored device.

(6) The Permittee shall establish a range for monitored parameters that indicates proper operation of the control or recovery device. In order to establish the range, the information required in 40 CFR 63.999(b)(3) shall be submitted in the Notification of Compliance Status or the operating permit application or amendment. The range may be based upon a prior performance test meeting the specifications of 40 CFR 63.997(b)(1) or a prior TRE index value determination, as applicable, or upon existing ranges or limits established under a referencing

subpart. Where the regeneration stream flow and carbon bed temperature are monitored, the range shall be in terms of the total regeneration stream flow per regeneration cycle and the temperature of the carbon bed determined within 15 minutes of the completion of the regeneration cooling cycle.

(d) Pursuant to 40 CFR 63.996(d), alternative monitoring requirements are specified below:

(1) Alternatives to the continuous operating parameter monitoring and recordkeeping provisions. The Permittee may request approval to use alternatives to the continuous operating parameter monitoring and recordkeeping provisions listed in 40 CFR 63.990(c), 63.994(c), 63.998(a)(2) through 63.998(a)(4), 63.998(c)(2) and 63.998(c)(3), as specified in 63.999(d)(1).

(2) Monitoring a different parameter than those listed. The Permittee may request approval to monitor a different parameter than those established in 40 CFR 63.996(c)(6) or to set unique monitoring parameters if directed by 40 CFR 63.994(c)(2) as specified in 63.999(d)(2).

Compliance Determination Requirements

EE.9 Absorbers, condensers, and carbon adsorbers used as control devices:
[326 IAC 14][40 CFR 63.990 Subpart SS]

(a) [Applicable under EE.5]

(b) Pursuant to 40 CFR 63.990(b), except as specified in 40 CFR 63.997(b), the Permittee shall conduct an initial performance test of any absorber, condenser, or carbon adsorber used as a control device to comply with the provisions of the referencing subpart and 40 CFR Part 63, Subpart SS according to the procedures in 40 CFR 63.997. Performance test records shall be kept as specified in 40 CFR 63.998(a)(2) and a performance test report shall be submitted as specified in 40 CFR 63.999(a)(2). As provided in 40 CFR 63.985(b)(1), a design evaluation may be used as an alternative to the performance test for storage vessels controls. As provided in 40 CFR 63.986(b), no performance test is required to demonstrate compliance for equipment leaks.

(c) [Reserved]

EE.10 Halogen scrubbers and other halogen reduction devices:
[326 IAC 14][40 CFR 63.994 Subpart SS]

(a) [Applicable under EE.7]

(b) Pursuant to 40 CFR 63.994(b), halogen scrubber and other halogen reduction devices shall meet the following performance test requirements:

(1) The Permittee of a combustion device followed by a halogen scrubber or other halogen reduction device to control halogenated vent streams in accordance with a referencing subpart and 40 CFR Part 63, Subpart SS shall conduct an initial performance test to determine compliance with the control efficiency or emission limits for hydrogen halides and halogens according to the procedures in 40 CFR 63.997. Performance test records shall be kept as specified in 40 CFR 63.998(a)(2) and a performance test report shall be submitted as specified in 40 CFR 63.999(a)(2).

(2) The Permittee of a halogen scrubber or other halogen reduction technique used to reduce the vent stream halogen atom mass emission rate prior to a combustion device to comply with a performance level specified in a referencing subpart shall determine the halogen atom mass emission rate prior to the combustion device according to the procedures specified in the referencing

subpart. Records of the halogen concentration in the vent stream shall be generated as specified in 40 CFR 63.998(a)(4).

(c) [Reserved]

EE.11 Performance test and compliance assessment requirements for control devices: [326 IAC 14][40 CFR 63.997 Subpart SS]

(a) Pursuant to 40 CFR 63.997(a), where 40 CFR 63.985 through 63.995 require, or the Permittee elects to conduct, a performance test of a control device or a halogen reduction device, the requirements of 40 CFR 63.997(b) through 63.997(d) apply.

(b) Pursuant to 40 CFR 63.997(b), initial performance tests are required only as specified in 40 CFR Part 63, Subpart SS or a referencing subpart.

(1) Unless requested by IDEM, OAQ, the Permittee is not required to conduct a performance test under 40 CFR Part 63, Subpart SS if a prior performance test was conducted using the same methods specified in 40 CFR 63.997(e) or 63.987(b)(3), as applicable, and either no process changes have been made since the test, or the Permittee can demonstrate that the results of the performance test or compliance demonstration, with or without adjustments, reliably demonstrate compliance despite process changes. The Permittee may request permission to substitute a prior performance test by written application to IDEM, OAQ as specified in 40 CFR 63.999(a)(1)(iv).

(2) Individual performance tests may be waived upon written application to IDEM, OAQ, per 40 CFR 63.999(a)(1)(iii), if, in IDEM, OAQ's judgment, the source is meeting the relevant standard(s) on a continuous basis, the source is being operated under an extension or waiver of compliance, or the Permittee has requested an extension or waiver of compliance and IDEM, OAQ is still considering that request.

(3) Approval of any waiver granted under 40 CFR 63.997 shall not abrogate IDEM, OAQ's authority under the Clean Air Act or in any way prohibit IDEM, OAQ from later canceling the waiver. The cancellation will be made only after notification is given to the Permittee of the source.

(c) Pursuant to 40 CFR 63.997(c), performance tests shall meet the following schedule:

(1) Unless a waiver of performance testing is obtained under 40 CFR 63.997 or the conditions of a referencing subpart, the Permittee shall perform such tests as specified in 40 CFR 63.997(c)(1)(i) through 63.997(c)(1)(vii).

(i) Within 180 days after the effective date of a relevant standard for a new source that has an initial start-up date before the effective date of that standard; or

(ii) Within 180 days after initial start-up for a new source that has an initial start-up date after the effective date of a relevant standard; or

(iii) Within 180 days after the compliance date specified in a referencing subpart for an existing source, or within 180 days after start-up of an existing source if the source begins operation after the effective date of the relevant emission standard; or

(iv) Within 180 days after the compliance date for an existing source subject to an emission standard established pursuant to section 112(f) of the Clean Air Act; or

(v) Within 180 days after the termination date of the source's extension of compliance or a waiver of compliance for an existing source that obtains an extension of compliance under 40 CFR 63.1112(a), or waiver of compliance under 40 CFR 61.11; or

(vi) Within 180 days after the compliance date for a new source, subject to an emission standard established pursuant to section 112(f) of the Clean Air Act, for which construction or reconstruction is commenced after the proposal date of a relevant standard established pursuant to section 112(d) of the Clean Air Act but before the proposal date of the relevant standard established pursuant to section 112(f); or

(vii) When the promulgated emission standard in a referencing subpart is more stringent than the standard that was proposed, the Permittee of a new or reconstructed source subject to that standard for which construction or reconstruction is commenced between the proposal and promulgation dates of the standard shall comply with performance testing requirements within 180 days after the standard's effective date, or within 180 days after start-up of the source, whichever is later. If a promulgated standard in a referencing subpart is more stringent than the proposed standard, the Permittee may choose to demonstrate compliance initially with either the proposed or the promulgated standard. If the Permittee chooses to comply with the proposed standard initially, the Permittee shall conduct a second performance test within 3 years and 180 days after the effective date of the standard, or after start-up of the source, whichever is later, to demonstrate compliance with the promulgated standard.

(2) IDEM, OAQ may require the Permittee to conduct performance tests and compliance assessments at the regulated source at any time when the action is authorized by section 114 of the Clean Air Act.

(3) Unless already permitted by the applicable Title V permit, if the Permittee elects to use a recovery device to replace an existing control device at a later date, or elects to use a different nonflare control device or final recovery device at a later date, the Permittee shall notify IDEM, OAQ, either by amendment of the regulated source's Title V permit. Upon implementing the change, a compliance demonstration or performance test shall be performed according to the provisions of 40 CFR 63.997(c)(3)(i) through 63.997(c)(3)(v), as applicable, within 180 days. The compliance assessment report shall be submitted to IDEM, OAQ within 60 days of completing the determination, as provided in 40 CFR 63.999(a)(1)(ii).

(i) [Reserved]

(ii) [Reserved]

(iii) [Reserved]

(iv) For absorbers, condensers, or carbon adsorbers used to replace an existing control device on a process vent, a performance test shall be performed, using the methods specified in 40 CFR 63.997;

(v) For absorbers, condensers, or carbon adsorbers used to replace an existing final recovery device on a process vent, the Permittee shall comply with the applicable provisions of a referencing subpart and 40 CFR Part 63, Subpart SS;

(d) Pursuant to 40 CFR 63.997(d), if required to do performance testing, the Permittee of each new regulated source and, at the request of IDEM, OAQ, the Permittee of each existing regulated source, shall provide performance testing facilities as specified in 40 CFR 63.997(d)(1) through 63.997(d)(5).

(1) Sampling ports adequate for test methods applicable to such source. This includes, as applicable, the requirements specified in 40 CFR 63.997(d)(1)(i) and 63.997(d)(1)(ii).

(i) Constructing the air pollution control system such that volumetric flow rates and pollutant emission rates can be accurately determined by applicable test methods and procedures; and

(ii) Providing a stack or duct free of cyclonic flow during performance tests, as demonstrated by applicable test methods and procedures;

(2) Safe sampling platform(s);

(3) Safe access to sampling platform(s);

(4) Utilities for sampling and testing equipment; and

(5) Any other facilities that IDEM, OAQ deems necessary for safe and adequate testing of a source.

(e) Pursuant to 40 CFR 63.997(e), where 40 CFR 63.985 through 63.995 require the Permittee to conduct a performance test of a control device or a halogen reduction device, the Permittee shall follow the requirements of 40 CFR 63.997(e)(1)(i) through 63.997(e)(1)(v), as applicable.

(1) General procedures.

(i) Continuous unit operations. For continuous unit operations, performance tests shall be conducted at maximum representative operating conditions for the process, unless IDEM, OAQ specifies or approves alternate operating conditions. During the performance test, the Permittee may operate the control or halogen reduction device at maximum or minimum representative operating conditions for monitored control or halogen reduction device parameters, whichever results in lower emission reduction. Operations during periods of start-up, shutdown, and malfunction shall not constitute representative conditions for the purpose of a performance test.

(ii) [Reserved]

(iii) Combination of both continuous and batch unit operations. For a combination of both continuous and batch unit operations, performance tests shall be conducted at maximum representative operating conditions. For the purpose of conducting a performance test on a combined vent stream, maximum representative operating conditions shall be when batch emission episodes are occurring that result in the highest organic HAP emission rate (for the combined vent stream) that is achievable during the 6-month period that begins 3 months before and ends 3 months after the compliance assessment (e.g. TRE calculation, performance test) without causing any of the situations described in paragraphs 40 CFR 63.997(e)(1)(iii)(A) through 63.997(e)(1)(iii)(C).

(A) Causing damage to equipment;

(B) Necessitating that the Permittee make product that does not meet an existing specification for sale to a customer; or

(C) Necessitating that the Permittee make product in excess of demand.

(iv) Alternatives to performance test requirements. Performance tests shall be conducted and data shall be reduced in accordance with the test methods and procedures set forth in 40 CFR Part 63, Subpart SS, in each relevant standard, and, if required, in applicable appendices of 40 CFR Parts 51, 60, 61, and 63 unless IDEM, OAQ specifies one of the provisions in 40 CFR 63.997(e)(1)(iv)(A) through 63.997(e)(1)(iv)(E).

(A) Specifies or approves, in specific cases, the use of a test method with minor changes in methodology; or

(B) Approves the use of an alternative test method, the results of which IDEM, OAQ has determined to be adequate for indicating whether a specific regulated source is in compliance. The alternate method or data shall be validated using the applicable procedures of Method 301 of Appendix A of 40 CFR Part 63; or

(C) Approves shorter sampling times and smaller sample volumes when necessitated by process variables or other factors; or

(D) Waives the requirement for the performance test as specified in 40 CFR 63.997(b)(2) because the Permittee of a regulated source has demonstrated by other means to IDEM, OAQ's satisfaction that the regulated source is in compliance with the relevant standard; or

(E) Approves the use of an equivalent method.

(v) Performance test runs. Each performance test shall consist of three separate runs using the applicable test method. Each run shall be conducted for at least 1 hour and under the conditions specified in 40 CFR 63.997. For the purpose of determining compliance with an applicable standard, the arithmetic means of results of the three runs shall apply. In the event that a sample is accidentally lost or conditions occur in which one of the three runs must be discontinued because of forced shutdown, failure of an irreplaceable portion of the sample train, extreme meteorological conditions, or other circumstances, beyond the Permittee's control, compliance may, upon IDEM, OAQ's approval, be determined using the arithmetic mean of the results of the two other runs.

(A) [Reserved]

(B) [Reserved]

(2) Specific procedures. Where 40 CFR 63.985 through 63.995 require the Permittee to conduct a performance test of a control device, or a halogen reduction device, the Permittee shall conduct that performance test using the procedures in 40 CFR 63.997(e)(2)(i) through 63.997(e)(2)(iv), as applicable. The regulated material concentration and percent reduction may be measured as either total organic regulated material or as TOC minus methane and ethane according to the procedures specified.

(i) Selection of sampling sites. Method 1 or 1A of 40 CFR Part 60, Appendix A, as appropriate, shall be used for selection of the sampling sites.

(A) For determination of compliance with a percent reduction requirement of total organic regulated material or TOC, sampling sites shall be located as specified in 40 CFR 63.997(e)(2)(i)(A)(1) and 63.997(e)(2)(i)(A)(2), and at the outlet of the control device.

(1) With the exceptions noted below in 40 CFR 63.997(e)(2)(i)(A)(2) and 63.997(e)(2)(i)(A)(3), the control device inlet sampling site shall be located at the exit from the unit operation before any control device.

(2) For process vents from continuous unit operations at affected sources in subcategories where the applicability criteria includes a TRE index value, the control device inlet sampling site shall be located after the final recovery device.

(3) [Reserved]

(B) For determination of compliance with a parts per million by volume total regulated material or TOC limit in a referencing subpart, the sampling site shall be located at the outlet of the control device.

(ii) Gas volumetric flow rate. The gas volumetric flow rate shall be determined using Method 2, 2A, 2C, 2D, 2F, or 2G of 40 CFR Part 60, Appendix A, as appropriate.

(iii) Total organic regulated material or TOC concentration. To determine compliance with a parts per million by volume total organic regulated material or TOC limit, the Permittee shall use Method 18 or 25A of 40 CFR Part 60, Appendix A, as applicable. The ASTM D6420–99 may be used in lieu of Method 18 of 40 CFR Part 60, Appendix A, under the conditions specified in 40 CFR 63.997(e)(2)(iii)(D)(1) through 63.997(e)(2)(iii)(D)(3). Alternatively, any other method or data that have been validated according to the applicable procedures in Method 301 of Appendix A of 40 CFR Part 63 may be used. The procedures specified in 40 CFR 63.997(e)(2)(iii)(A), 63.997(e)(2)(iii)(B), 63.997(e)(2)(iii)(D), and 63.997(e)(2)(iii)(E) shall be used to calculate parts per million by volume concentration. The calculated concentration shall be corrected to 3 percent oxygen using the procedures specified in 40 CFR 63.997(e)(2)(iii)(C) if a combustion device is the control device and supplemental combustion air is used to combust the emissions.

(A) Sampling time. For continuous unit operations and for a combination of both continuous and batch unit operations, the minimum sampling time for each run shall be 1 hour in which either an integrated sample or a minimum of four grab samples shall be taken. If grab sampling is used, then the samples shall be taken at approximately equal intervals in time, such as 15 minute intervals during the run.

(B) Concentration calculation. The concentration of either TOC (minus methane or ethane) or total organic regulated material

shall be calculated according to 40 CFR 63.997(e)(2)(iii)(B)(1) or 63.997(e)(2)(iii)(B)(2).

(1) The TOC concentration (CTOC) is the sum of the concentrations of the individual components and shall be computed for each run using Equation 2.

$$C_{TOC} = \sum_{i=1}^{x} \frac{\left(\sum_{j=1}^{n} C_{ji} \right)}{x} \qquad [Eq.\ 2]$$

Where:

CTOC = Concentration of TOC (minus methane and ethane), dry basis, parts per million by volume.

x = Number of samples in the sample run.

n = Number of components in the sample.

Cji = Concentration of sample components j of sample I, dry basis, parts per million by volume.

(2) The total organic regulated material (CREG) shall be computed according to Equation 2 in 40 CFR 63.997(e)(2)(iii)(B)(1) except that only the regulated species shall be summed.

(C) Concentration correction calculation. The concentration of TOC or total organic regulated material, as applicable, shall be corrected to 3 percent oxygen if a combustion device is the control device and supplemental combustion air is used to combust the emissions.

(1) The emission rate correction factor (or excess air), integrated sampling and analysis procedures of Method 3B of 40 CFR Part 60, Appendix A, or American Society of Mechanical Engineers (ASME) PTC 19–10–1981-– Part 10 (available for purchase from: ASME International, Three Park Avenue, New York, NY 10016–5990, 800–843–2763 or 212–591–7722), shall be used to determine the oxygen concentration. The sampling site shall be the same as that of the organic regulated material or organic compound samples, and the samples shall be taken during the same time that the organic regulated material or organic compound samples are taken.

(2) The concentration corrected to 3 percent oxygen (Cc) shall be computed using Equation 3.

$$C_c = C_m \left(\frac{17.9}{20.9 - \%O_{2d}} \right) \qquad [Eq.\ 3]$$

Where:

Cc = Concentration of TOC or organic regulated material corrected to 3 percent oxygen, dry basis, parts per million by volume.

Cm = Concentration of TOC (minus methane and ethane) or organic regulated material, dry basis, parts per million by volume.

$\%O_2d$ = Concentration of oxygen, dry basis, percentage by volume.

(D) To measure the total organic regulated material concentration at the outlet of a control device, use Method 18 of 40 CFR Part 60, Appendix A, or ASTM D6420–99. If you have a combustion control device, you must first determine which regulated material compounds are present in the inlet gas stream using process knowledge or the screening procedure described in Method 18. In conducting the performance test, analyze samples collected at the outlet of the combustion control device as specified in Method 18 or ASTM D6420–99 for the regulated material compounds present at the inlet of the control device. The method ASTM D6420–99 may be used only under the conditions specified in 40 CFR 63.997(e)(2)(iii)(D)(1) through 63.997(e)(2)(iii)(D)(3).

(1) If the target compound(s) is listed in Section 1.1 of ASTM D6420–99 and the target concentration is between 150 parts per billion by volume and 100 parts per million by volume.

(2) If the target compound(s) is not listed in Section 1.1 of ASTM D6420–99 but is potentially detected by mass spectrometry, an additional system continuing calibration check after each run, as detailed in Section 10.5.3 of ASTM D6420–99, must be followed, met, documented, and submitted with the performance test report even if you do not use a moisture condenser or the compound is not considered soluble.

(3) If a minimum of one sample/analysis cycle is completed at least every 15 minutes.

(E) To measure the TOC concentration, use Method 18 of 40 CFR Part 60, Appendix A, or use Method 25A of 40 CFR Part 60, Appendix A, according to the procedures in 40 CFR 63.997(e)(2)(iii)(E)(1) through 63.997(e)(2)(iii)(E)(4).

(1) Calibrate the instrument on the predominant regulated material compound.

(2) The test results are acceptable if the response from the high level calibration gas is at least 20 times the standard deviation for the response from the zero calibration gas when the instrument is zeroed on its most sensitive scale.

(3) The span value of the analyzer must be less than 100 parts per million by volume.

(4) Report the results as carbon, calculated according to Equation 25A–1 of Method 25A of 40 CFR Part 60, Appendix A.

(iv) Percent reduction calculation. To determine compliance with a percent reduction requirement, the Permittee shall use Method 18, 25, or 25A of 40 CFR Part 60, Appendix A, as applicable. The method ASTM D6420–99 may be used in lieu of Method 18 of 40 CFR Part 60, Appendix A, under the conditions specified in 40 CFR 63.997(e)(2)(iii)(D)(1) through 63.997(e)(2)(iii)(D)(3). Alternatively, any other method or data that have been validated according to the applicable procedures in Method 301 of Appendix A of 40 CFR Part 63 may be used. The procedures specified in 40 CFR 63.997(e)(2)(iv)(A) through 63.997(e)(2)(iv)(I) shall be used to calculate percent reduction efficiency.

(A) Sampling time. The minimum sampling time for each run shall be 1 hour in which either an integrated sample or a minimum of four grab samples shall be taken. If grab sampling is used, then the samples shall be taken at approximately equal intervals in time, such as 15-minute intervals during the run.

(B) Mass rate of TOC or total organic regulated material. The mass rate of either TOC (minus methane and ethane) or total organic regulated material (EI, Eo) shall be computed as applicable.

(1) Equations 4 and 5 shall be used.

$$E_i = K_2 \left(\sum_{j=1}^{n} C_{ij} M_{ij} \right) Q_i \qquad [Eq.\ 4]$$

$$E_o = K_2 \left(\sum_{j=1}^{n} C_{oj} M_{oj} \right) Q_o \qquad [Eq.\ 5]$$

Where:

EI, Eo = Emission rate of TOC (minus methane and ethane) (ETOC) or emission rate of total organic regulated material (ERM) in the sample at the inlet and outlet of the control device, respectively, dry basis, kilogram per hour.

K2 = Constant, 2.494 × 10-6 (parts per million)-1 (gram-mole per standard cubic meter) (kilogram per gram) (minute per hour), where standard temperature (gram-mole per standard cubic meter) is 20℃.

n = Number of components in the sample.

Cij, Coj = Concentration on a dry basis of organic compound j in parts per million by volume of the gas stream at the inlet and outlet of the control device, respectively. If the TOC emission rate is being calculated, Cij and Coj include all organic compounds measured minus methane and ethane; if the total

organic regulated material emissions rate is being calculated, only organic regulated material are included.

Mij, Moj = Molecular weight of organic compound j, gram per gram-mole, of the gas stream at the inlet and outlet of the control device, respectively.

QI, Qo = Process vent flow rate, dry standard cubic meter per minute, at a temperature of 20°C, at the inlet and outlet of the control device, respectively.

(2) [Reserved]

(3) [Reserved]

(C) Percent reduction in TOC or total organic regulated material for continuous unit operations and a combination of both continuous and batch unit operations. For continuous unit operations and for a combination of both continuous and batch unit operations, the percent reduction in TOC (minus methane and ethane) or total organic regulated material shall be calculated using Equation 6.

$$R = \frac{E_i - E_o}{E_i}(100) \qquad [Eq.\ 6]$$

Where:

R = Control efficiency of control device, percent.

EI = Mass rate of TOC (minus methane and ethane) or total organic regulated material at the inlet to the control device as calculated under 40 CFR 63.997(e)(2)(iv)(B), kilograms TOC per hour or kilograms organic regulated material per hour.

Eo = Mass rate of TOC (minus methane and ethane) or total organic regulated material at the outlet of the control device, as calculated under 40 CFR 63.997(e)(2)(iv)(B), kilograms TOC per hour or kilograms total organic regulated material per hour.

(D) [Reserved]

(E) [Reserved]

(F) To measure inlet and outlet concentrations of total organic regulated material, use Method 18 of 40 CFR Part 60, Appendix A, or ASTM D6420–99, under the conditions specified in 40 CFR 63.997(e)(2)(iii)(D)(1) through 63.997(e)(2)(iii)(D)(3). In conducting the performance test, collect and analyze samples as specified in Method 18 or ASTM D6420–99. You must collect samples simultaneously at the inlet and outlet of the control device. If the performance test is for a combustion control device, you must first determine which regulated material compounds are present in the inlet gas stream (i.e., uncontrolled emissions) using process knowledge or the screening procedure described in Method 18. Quantify the emissions for the regulated material compounds present in the inlet gas stream for both the inlet and outlet gas streams for the combustion device.

(G) To determine inlet and outlet concentrations of TOC, use Method 25 of 40 CFR Part 60, Appendix A. Measure the total gaseous non-methane organic (TGNMO) concentration of the inlet and outlet vent streams using the procedures of Method 25. Use the TGNMO concentration in Equations 4 and 5 of 40 CFR 63.997(e)(2)(iv)(B).

(H) Method 25A of 40 CFR Part 60, Appendix A, may be used instead of Method 25 to measure inlet and outlet concentrations of TOC if the condition in either 40 CFR 63.997(e)(2)(iv)(H)(1) or 63.997(e)(2)(iv)(H)(2) is met.

(1) The concentration at the inlet to the control system and the required level of control would result in exhaust TGNMO concentrations of 50 parts per million by volume or less.

(2) Because of the high efficiency of the control device, the anticipated TGNMO concentration of the control device exhaust is 50 parts per million by volume or less, regardless of the inlet concentration.

(I) [Reserved]

Recordkeeping and Reporting Requirements

EE.12 Recordkeeping requirements: [326 IAC 14][40 CFR 63.998 Subpart SS]

(a) Pursuant to 40 CFR 63.998(a), the Permittee shall maintain the following compliance assessment, monitoring, and compliance records.

(1) [Reserved]

(2) Nonflare control device performance test records.

(i) Availability of performance test records. Upon request, the Permittee shall make available to IDEM, OAQ such records as may be necessary to determine the conditions of performance tests performed pursuant to 40 CFR 63.990(b), 63.994(b).

(ii) Nonflare control device and halogen reduction device performance test records.

(A) General requirements. Each Permittee subject to the provisions of 40 CFR Part 63, Subpart SS shall keep up-to-date, readily accessible continuous records of the data specified in 40 CFR 63.998(a)(2)(ii)(B) through 63.998(a)(2)(ii)(C), as applicable, measured during each performance test performed pursuant to 40 CFR 63.990(b), 63.994(b) and also include that data in the Notification of Compliance Status required under 40 CFR 63.999(b). The same data specified in 40 CFR Part 63, Subpart SS shall be submitted in the reports of all subsequently required performance tests where either the emission control efficiency of a combustion device, or the outlet concentration of TOC or regulated material is determined.

(B) [Reserved]

(C) Other nonflare control devices. Where the Permittee seeks to use an absorber, as a control device, the information specified in 40 CFR 63.998(a)(2)(ii)(C)(1) through 63.998(a)(2)(ii)(C)(5) shall be recorded, as applicable.

(1) Where an absorber is used as the control device, the exit specific gravity and average exit temperature of the absorbing liquid averaged over the same time period as the performance test (both measured while the vent stream is normally routed and constituted); or

(2) [Reserved]

(3) [Reserved]

(4) As an alternative to paragraph 40 CFR 63.998(a)(2)(ii)(C)(1), the concentration level or reading indicated by an organics monitoring device at the outlet of the absorber, averaged over the same time period as the performance test while the vent stream is normally routed and constituted.

(5) For an absorber, used as a control device, the percent reduction of regulated material achieved by the control device or concentration of regulated material (parts per million by volume, by compound) at the outlet of the control device.

(D) [Reserved]

(3) Recovery device monitoring records during TRE index value determination. For process vents that require control of emissions under a referencing subpart, the Permittee using a recovery device to maintain a TRE above a level specified in the referencing subpart shall maintain the continuous records specified in 40 CFR 63.998(a)(3)(i) through 63.998(a)(3)(v), as applicable, and submit reports as specified in 40 CFR 63.999(a)(2)(iii)(C).

(i) Where an absorber is the final recovery device in the recovery system and the saturated scrubbing fluid and specific gravity of the scrubbing fluid is greater than or equal to 0.02 specific gravity units, the exit specific gravity (or alternative parameter that is a measure of the degree of absorbing liquid saturation if approved by IDEM, OAQ) and average exit temperature of the absorbing liquid averaged over the same time period as the TRE index value determination (both measured while the vent stream is normally routed and constituted); or

(ii) [Reserved]

(iii) [Reserved]

(iv) As an alternative to paragraph 40 CFR 63.998(a)(3)(i), the concentration level or reading indicated by an organics monitoring device at the outlet of the absorber, averaged over the same time period as the TRE index value determination while the vent stream is normally routed and constituted.

(v) All measurements and calculations performed to determine the TRE index value of the vent stream as specified in a referencing subpart.

(4) Halogen concentration records. Record the halogen concentration in the vent stream determined according to the procedures specified in a referencing subpart.

(b) Pursuant to 40 CFR 63.998(b), the Permittee shall handle continuous records and monitoring system data as follows:

(1) Continuous records. Where 40 CFR Part 63, Subpart SS requires a continuous record, the Permittee shall maintain a record as specified in 40 CFR 63.998(b)(1)(i) through 63.998(b)(1)(iv), as applicable:

(i) A record of values measured at least once every 15 minutes or each measured value for systems which measure more frequently than once every 15 minutes; or

(ii) A record of block average values for 15-minute or shorter periods calculated from all measured data values during each period or from at least one measured data value per minute if measured more frequently than once per minute.

(iii) Where data is collected from an automated continuous parameter monitoring system, the Permittee may calculate and retain block hourly average values from each 15-minute block average period or from at least one measured value per minute if measured more frequently than once per minute, and discard all but the most recent three valid hours of continuous (15-minute or shorter) records, if the hourly averages do not exclude periods of CPMS breakdown or malfunction. An automated CPMS records the measured data and calculates the hourly averages through the use of a computerized data acquisition system.

(iv) A record as required by an alternative approved under a referencing subpart.

(2) Excluded data. Monitoring data recorded during periods identified in 40 CFR 63.998(b)(2)(i) through 63.998(b)(2)(iii) shall not be included in any average computed to determine compliance with an emission limit in a referencing subpart.

(i) Monitoring system breakdowns, repairs, preventive maintenance, calibration checks, and zero (low-level) and high-level adjustments;

(ii) Periods of non-operation of the process unit (or portion thereof), resulting in cessation of the emissions to which the monitoring applies; and

(iii) Start-ups, shutdowns, and malfunctions, if the Permittee follows the applicable provisions of the start-up, shutdown, and malfunction plan required by a referencing subpart and maintains the records specified in 40 CFR 63.998(d)(3).

(3) Records of daily averages. In addition to the records specified in 40 CFR 63.998(a), the Permittee shall keep records as specified in 40 CFR 63.998(b)(3)(i) and 63.998(b)(3)(ii) and submit reports as specified in 40 CFR 63.999(c), unless an alternative recordkeeping system has been requested and approved under a referencing subpart.

(i) Except as specified in 40 CFR 63.998(b)(3)(ii), daily average values of each continuously monitored parameter shall be calculated from data

meeting the specifications of 40 CFR 63.998(b)(2) for each operating day and retained for 5 years.

(A) The daily average shall be calculated as the average of all values for a monitored parameter recorded during the operating day. The average shall cover a 24-hour period if operation is continuous, or the period of operation per operating day if operation is not continuous (e.g., for transfer racks the average shall cover periods of loading). If values are measured more frequently than once per minute, a single value for each minute may be used to calculate the daily average instead of all measured values.

(B) The operating day shall be the period defined in the operating permit or in the Notification of Compliance Status. It may be from midnight to midnight or another daily period.

(ii) If all recorded values for a monitored parameter during an operating day are within the range established in the Notification of Compliance Status or in the operating permit, the Permittee may record that all values were within the range and retain this record for 5 years rather than calculating and recording a daily average for that operating day. In such cases, the Permittee may not discard the recorded values as allowed in 40 CFR 63.998(b)(1)(iii).

(4) [Reserved]

(5) Alternative recordkeeping. For any parameter with respect to any item of equipment associated with a process vent, the Permittee may implement the recordkeeping requirements in 40 CFR 63.998(b)(5)(i) or 63.998(b)(5)(ii) as alternatives to the recordkeeping provisions listed in 40 CFR 63.998(b)(1) through 63.998(b)(3). The Permittee shall retain each record required by 63.998(b)(5)(i) or 63.998(b)(5)(ii) as provided in a referencing subpart.

(i) The Permittee may retain only the daily average value, and is not required to retain more frequently monitored operating parameter values, for a monitored parameter with respect to an item of equipment, if the requirements of 40 CFR 63.998(b)(5)(i)(A) through 63.998(b)(5)(i)(F) are met. The Permittee shall notify IDEM, OAQ in the Notification of Compliance Status as specified in 40 CFR 63.999(b)(5) or, if the Notification of Compliance Status has already been submitted, in the Periodic Report immediately preceding implementation of the requirements of 40 CFR 63.998(b)(5)(i), as specified in 40 CFR 63.999(c)(6)(iv).

(A) The monitoring system is capable of detecting unrealistic or impossible data during periods of operation other than start-ups, shutdowns or malfunctions (e.g., a temperature reading of -200□C on a boiler), and will alert the operator by alarm or other means. The Permittee shall record the occurrence. All instances of the alarm or other alert in an operating day constitute a single occurrence.

(B) The monitoring system generates a running average of the monitoring values, updated at least hourly throughout each operating day, that have been obtained during that operating day, and the capability to observe this average is readily available to IDEM, OAQ on-site during the operating day. The

Permittee shall record the occurrence of any period meeting the criteria in 40 CFR 63.998(b)(5)(i)(B)(1) through 63.998(b)(5)(i)(B)(3). All instances in an operating day constitute a single occurrence.

(1) The running average is above the maximum or below the minimum established limits;

(2) The running average is based on at least six one-hour average values; and

(3) The running average reflects a period of operation other than a start-up, shutdown, or malfunction.

(C) The monitoring system is capable of detecting unchanging data during periods of operation other than start-ups, shutdowns or malfunctions, except in circumstances where the presence of unchanging data is the expected operating condition based on past experience (e.g., pH in some scrubbers), and will alert the operator by alarm or other means. The Permittee shall record the occurrence. All instances of the alarm or other alert in an operating day constitute a single occurrence.

(D) The monitoring system will alert the Permittee by an alarm, if the running average parameter value calculated under 40 CFR 63.998(b)(5)(i)(B) reaches a set point that is appropriately related to the established limit for the parameter that is being monitored.

(E) The Permittee shall verify the proper functioning of the monitoring system, including its ability to comply with the requirements of 40 CFR 63.998(b)(5)(i), at the times specified in 40 CFR 63.998(b)(5)(i)(E)(1) through 63.998(b)(5)(i)(E)(3). The Permittee shall document that the required verifications occurred.

(1) Upon initial installation.

(2) Annually after initial installation.

(3) After any change to the programming or equipment constituting the monitoring system that might reasonably be expected to alter the monitoring system's ability to comply with the requirements of 40 CFR 63.998.

(F) The Permittee shall retain the records identified in 40 CFR 63.998(b)(5)(i)(F)(1) through 63.998(b)(5)(i)(F)(4).

(1) Identification of each parameter, for each item of equipment, for which the Permittee has elected to comply with the requirements of 40 CFR 63.998(b)(5)(i).

(2) A description of the applicable monitoring system(s), and of how compliance will be achieved with each requirement of 40 CFR 63.998(b)(5)(i)(A) through 63.998(b)(5)(i)(E). The description shall identify the location and format (e.g., on-line storage; log entries) for each required record. If the description changes, the Permittee shall retain both the current and the most

recent superseded description. The description, and the most recent superseded description, shall be retained as provided in the subpart that references 40 CFR Part 63, Subpart SS, except as provided in 40 CFR 63.998(b)(5)(i)(F)(1).

(3) A description, and the date, of any change to the monitoring system that would reasonably be expected to affect its ability to comply with the requirements of 40 CFR 63.998(b)(5)(i).

(4) The Permittee subject to paragraph 40 CFR 63.998(b)(5)(i)(F)(2) shall retain the current description of the monitoring system as long as the description is current, but not less than 5 years from the date of its creation. The current description shall be retained on-site at all times or be accessible from a central location by computer or other means that provides access within 2 hours after a request. The Permittee shall retain the most recent superseded description at least until 5 years from the date of its creation. The superseded description shall be retained on-site (or accessible from a central location by computer that provides access within 2 hours after a request) at least 6 months after being superseded. Thereafter, the superseded description may be stored off-site.

(ii) If the Permittee has elected to implement the requirements of 40 CFR 63.998(b)(5)(i), and a period of 6 consecutive months has passed without an excursion as defined in 40 CFR 63.998(b)(6)(i), the Permittee is no longer required to record the daily average value for that parameter for that unit of equipment, for any operating day when the daily average value is less than the maximum, or greater than the minimum established limit. With approval by IDEM, OAQ, monitoring data generated prior to the compliance date of 40 CFR Part 63, Subpart SS shall be credited toward the period of 6 consecutive months, if the parameter limit and the monitoring were required and/or approved by IDEM, OAQ.

(A) If the Permittee elects not to retain the daily average values, the Permittee shall notify IDEM, OAQ in the next Periodic Report, as specified in 40 CFR 63.999(c)(6)(i). The notification shall identify the parameter and unit of equipment.

(B) If there is an excursion as defined in 40 CFR 63.998(b)(6)(i) on any operating day after the Permittee has ceased recording daily averages as provided in 40 CFR 63.998(b)(5)(ii), the Permittee shall immediately resume retaining the daily average value for each operating day, and shall notify IDEM, OAQ in the next Periodic Report, as specified in 40 CFR 63.999(c). The Permittee shall continue to retain each daily average value until another period of 6 consecutive months has passed without an excursion as defined in 40 CFR 63.998(b)(6)(i).

(C) The Permittee shall retain the records specified in 40 CFR 63.998(b)(5)(i)(A) through 63.998(b)(5)(i)(F) for the duration specified in a referencing subpart. For any week, if compliance with 40 CFR 63.998(b)(5)(i)(A) through 63.998(b)(5)(i)(D) does

not result in retention of a record of at least one occurrence or measured parameter value, the Permittee shall record and retain at least one parameter value during a period of operation other than a start-up, shutdown, or malfunction.

(6) (i) For the purposes of 40 CFR 63.998, an excursion means that the daily average value of monitoring data for a parameter is greater than the maximum, or less than the minimum established value, except as provided in 40 CFR 63.998(b)(6)(i)(A) and 63.998(b)(6)(i)(B).

(A) The daily average value during any start-up, shutdown or malfunction shall not be considered an excursion if the Permittee follows the applicable provisions of the start-up, shutdown, and malfunction plan required by a referencing subpart and maintains the records specified in 40 CFR 63.998(d)(3).

(B) An excused excursion, as described in 40 CFR 63.998(b)(6)(ii), does not count toward the number of excursions for the purposes of 40 CFR Part 63, Subpart SS.

(ii) One excused excursion for each control device or recovery device for each semiannual period is allowed. If a source has developed a start-up, shutdown and malfunction plan, and a monitored parameter is outside its established range or monitoring data are not collected during periods of start-up, shutdown, or malfunction (and the source is operated during such periods in accordance with the start-up, shutdown, and malfunction plan) or during periods of nonoperation of the process unit or portion thereof (resulting in cessation of the emissions to which monitoring applies), then the excursion is not a violation and, in cases where continuous monitoring is required, the excursion does not count as the excused excursion for determining compliance.

(c) Pursuant to 40 CFR 63.998(c), The Permittee shall maintain the following source monitoring records for nonflare control and recovery devices.

(1) Monitoring system records. For process vents the Permittee subject to 40 CFR Part 63, Subpart SS shall keep the records specified in 40 CFR 63.998(c)(1), as well as records specified elsewhere in 40 CFR Part 63, Subpart SS.

(i) For a CPMS used to comply with 40 CFR, Part 63, a record of the procedure used for calibrating the CPMS.

(ii) For a CPMS used to comply with 40 CFR Part 63, Subpart SS, records of the information specified in 40 CFR 63.998(c)(ii)(A) through 63.998(c)(ii)(H), as indicated in a referencing subpart.

(A) The date and time of completion of calibration and preventive maintenance of the CPMS.

(B) The “as found” and “as left” CPMS readings, whenever an adjustment is made that affects the CPMS reading and a “no adjustment” statement otherwise.

(C) The start time and duration or start and stop times of any periods when the CPMS is inoperative.

(D) Records of the occurrence and duration of each start-up, shutdown, and malfunction of CPMS used to comply with 40

CFR Part 63, Subpart SS during which excess emissions (as defined in a referencing subpart) occur.

(E) For each start-up, shutdown, and malfunction during which excess emissions as defined in a referencing subpart occur, records whether the procedures specified in the source's start-up, shutdown, and malfunction plan were followed, and documentation of actions taken that are not consistent with the plan. These records may take the form of a “checklist,” or other form of recordkeeping that confirms conformance with the start-up, shutdown, and malfunction plan for the event.

(F) Records documenting each start-up, shutdown, and malfunction event.

(G) Records of CPMS start-up, shutdown, and malfunction event that specify that there were no excess emissions during the event, as applicable.

(H) Records of the total duration of operating time.

(2) Combustion control and halogen reduction device monitoring records.

(i) Each Permittee using a halogen reduction device to comply with 40 CFR Part 63, Subpart SS shall keep the following records up-to-date and readily accessible, as applicable. Continuous records of the equipment operating parameters specified to be monitored under 40 CFR 63.994(c) (halogen reduction device monitoring),or approved by IDEM, OAQ in accordance with a referencing subpart.

(ii) Each Permittee shall keep records of the daily average value of each continuously monitored parameter for each operating day determined according to the procedures specified in 40 CFR 63.998(b)(3)(i).

(iii) Each Permittee subject to the provisions of 40 CFR Part 63, Subpart SS shall keep up-to-date, readily accessible records of periods of operation during which the parameter boundaries are exceeded. The parameter boundaries are established pursuant to 40 CFR 63.996(c)(6).

(3) Monitoring records for recovery devices, absorbers, condensers, carbon adsorbers or other noncombustion systems used as control devices.

(i) Each Permittee using a recovery device to achieve and maintain a TRE index value greater than the control applicability level specified in the referencing subpart but less than 4.0 or using an absorber as a control device shall keep readily accessible, continuous records of the equipment operating parameters specified to be monitored under 40 CFR 63.990(c) (absorber, condenser, and carbon adsorber monitoring), 63.993(c) (recovery device monitoring), or as approved by IDEM, OAQ in accordance with a referencing subpart.

(ii) Each Permittee shall keep records of the daily average value of each continuously monitored parameter for each operating day determined according to the procedures specified in 40 CFR 63.998(b)(3)(i).

(iii) Each Permittee subject to the provisions of 40 CFR Part 63, Subpart SS shall keep up-to-date, readily accessible records of periods of operation

during which the parameter boundaries are exceeded. The parameter boundaries are established pursuant to 40 CFR 63.996(c)(6).

(d) Pursuant to 40 CFR 63.998(d), the Permittee shall maintain the following other records.

(1) Closed vent system records. For closed vent systems the Permittee shall record the information specified in 40 CFR 63.998(d)(1)(i) through 63.998(d)(1)(iv), as applicable.

(i) For closed vent systems collecting regulated material from a regulated source, the Permittee shall record the identification of all parts of the closed vent system, that are designated as unsafe or difficult to inspect, an explanation of why the equipment is unsafe or difficult to inspect, and the plan for inspecting the equipment required by 40 CFR 63.983(b)(2)(ii) or 63.983(b)(2)(iii).

(ii) For each closed vent system that contains bypass lines that could divert a vent stream away from the control device and to the atmosphere, the Permittee shall keep a record of the information specified in either 40 CFR 63.998(d)(1)(ii)(A) or 63.998(d)(1)(ii)(B), as applicable.

(A) Hourly records of whether the flow indicator specified under 40 CFR 63.983(a)(3)(i) was operating and whether a diversion was detected at any time during the hour, as well as records of the times of all periods when the vent stream is diverted from the control device or the flow indicator is not operating.

(B) Where a seal mechanism is used to comply with 40 CFR 63.983(a)(3)(ii), hourly records of flow are not required. In such cases, the Permittee shall record that the monthly visual inspection of the seals or closure mechanisms has been done, and shall record the occurrence of all periods when the seal mechanism is broken, the bypass line valve position has changed, or the key for a lock-and-key type lock has been checked out, and records of any car-seal that has been broken.

(iii) For a closed vent system collecting regulated material from a regulated source, when a leak is detected as specified in 40 CFR 63.983(d)(2), the information specified in 40 CFR 63.998(d)(1)(iii)(A) through 63.998(d)(1)(iii)(F) shall be recorded and kept for 5 years.

(A) The instrument and the equipment identification number and the operator name, initials, or identification number.

(B) The date the leak was detected and the date of the first attempt to repair the leak.

(C) The date of successful repair of the leak.

(D) The maximum instrument reading measured by the procedures in 40 CFR 63.983(c) after the leak is successfully repaired or determined to be nonrepairable.

(E) “Repair delayed” and the reason for the delay if a leak is not repaired within 15 days after discovery of the leak. The Permittee may develop a written procedure that identifies the conditions that justify a delay of repair. In such cases, reasons for delay of

repair may be documented by citing the relevant sections of the written procedure.

(F) Copies of the Periodic Reports as specified in 40 CFR 63.999(c), if records are not maintained on a computerized database capable of generating summary reports from the records.

(iv) For each instrumental or visual inspection conducted in accordance with 40 CFR 63.983(b)(1) for closed vent systems collecting regulated material from a regulated source during which no leaks are detected, the Permittee shall record that the inspection was performed, the date of the inspection, and a statement that no leaks were detected.

(2) [Reserved]

(3) Regulated source and control equipment start-up, shutdown and malfunction records.

(i) Records of the occurrence and duration of each start-up, shutdown, and malfunction of operation of process equipment or of air pollution control equipment used to comply with 40 CFR, Part 63 during which excess emissions (as defined in a referencing subpart) occur.

(ii) For each start-up, shutdown, and malfunction during which excess emissions occur, records that the procedures specified in the source's start-up, shutdown, and malfunction plan were followed, and documentation of actions taken that are not consistent with the plan. For example, if a start-up, shutdown, and malfunction plan includes procedures for routing control device emissions to a backup control device (e.g., the incinerator for a halogenated stream could be routed to a flare during periods when the primary control device is out of service), records must be kept of whether the plan was followed. These records may take the form of a “checklist,” or other form of recordkeeping that confirms conformance with the start-up, shutdown, and malfunction plan for the event.

(4) Equipment leak records. The Permittee shall maintain records of the information specified in 40 CFR 63.998(d)(4)(i) and 63.998(d)(4)(ii) for closed vent systems and control devices if specified by the equipment leak provisions in a referencing subpart. The records specified in 40 CFR 63.998(d)(4)(i) shall be retained for the life of the equipment. The records specified in 40 CFR 63.998(d)(4)(ii) shall be retained for 5 years.

(i) The design specifications and performance demonstrations specified in 40 CFR 63.998(d)(4)(i)(A) through 63.998(d)(4)(i)(C).

(A) Detailed schematics, design specifications of the control device, and piping and instrumentation diagrams.

(B) The dates and descriptions of any changes in the design specifications.

(C) A description of the parameter or parameters monitored, as required in a referencing subpart, to ensure that control devices are operated and maintained in conformance with their design and an explanation of why that parameter (or parameters) was selected for the monitoring.

(ii) Records of operation of closed vent systems and control devices, as specified in 40 CFR 63.998(d)(4)(ii)(A) through 63.998(d)(4)(ii)(C).

(A) Dates and durations when the closed vent systems and control devices required are not operated as designed as indicated by the monitored parameters.

(B) Dates and durations during which the monitoring system or monitoring device is inoperative.

(C) Dates and durations of start-ups and shutdowns of control devices required in 40 CFR Part 63, Subpart SS.

(5) Records of monitored parameters outside of range. The Permittee shall record the occurrences and the cause of periods when the monitored parameters are outside of the parameter ranges documented in the Notification of Compliance Status report. This information shall also be reported in the Periodic Report.

EE.13 Notifications and other reports: [326 IAC 14][40 CFR 63.999 Subpart SS]

(a) Pursuant to 40 CFR 63.999(a), the Permittee shall submit notifications and reports of performance tests.

(1) General requirements. General requirements for performance test notifications and reports are specified in 40 CFR 63.999(a)(1)(i) through 63.999(a)(1)(iii).

(i) The Permittee shall notify IDEM, OAQ of the intention to conduct a performance test at least 30 days before such a compliance demonstration is scheduled to allow IDEM, OAQ the opportunity to have an observer present. If after 30 days notice for such an initially scheduled compliance demonstration, there is a delay (due to operational problems, etc.) in conducting the scheduled compliance demonstration, the Permittee of an affected facility shall notify IDEM, OAQ as soon as possible of any delay in the original demonstration date. The Permittee shall provide at least 7 days prior notice of the rescheduled date of the compliance demonstration, or arrange a rescheduled date with IDEM, OAQ by mutual agreement.

(ii) Unless specified differently in 40 CFR Part 63, Subpart SS or a referencing subpart, performance test reports, not submitted as part of a Notification of Compliance Status report, shall be submitted to IDEM, OAQ within 60 days of completing the test or determination.

(iii) Any application for a waiver of an initial performance test as allowed by 40 CFR 63.997(b)(2), shall be submitted no later than 90 days before the performance test or compliance assessment is required. The application for a waiver shall include information justifying the Permittee's request for a waiver, such as the technical or economic infeasibility, or the impracticality, of the source performing the test.

(iv) Any application to substitute a prior performance test for an initial performance test, as allowed by 40 CFR 63.997(b)(1), shall be submitted no later than 90 days before the performance test is required. The application for substitution shall include information demonstrating that the prior performance test or compliance assessment was conducted using the same methods specified in 40 CFR 63.997(e), as applicable. The application shall also include information demonstrating that no process changes have been made since the test, or that the results of

the performance test reliably demonstrate compliance despite process changes.

(2) Performance test report submittal and content requirements. Performance test reports shall be submitted as specified in 40 CFR 63.999(a)(2)(i) through 63.999(a)(2)(iii).

(i) For performance tests, the Notification of Compliance Status or performance test report shall include one complete test report as specified in 40 CFR 63.999(a)(2)(ii) for each test method used for a particular kind of emission point and other applicable information specified in 40 CFR 63.999(a)(2)(iii). For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of 40 CFR Part 63, Subpart SS shall be submitted, but a complete test report is not required.

(ii) A complete test report shall include a brief process description, sampling site description, description of sampling and analysis procedures and any modifications to standard procedures, quality assurance procedures, record of operating conditions during the test, record of preparation of standards, record of calibrations, raw data sheets for field sampling, raw data sheets for field and laboratory analyses, documentation of calculations, and any other information required by the test method.

(iii) The performance test report shall also include the information specified in 40 CFR 63.999(a)(2)(iii)(A) through 63.999(a)(2)(iii)(C), as applicable.

(A) [Reserved]

(B) For nonflare control device and halogen reduction device performance tests as required under 40 CFR 63.990(b), 63.994(b) also submit the records specified in 40 CFR 63.998(a)(2)(ii), as applicable.

(C) For recovery devices also submit the records specified in 40 CFR 63.998(a)(3), as applicable.

(b) Pursuant to 40 CFR 63.999(b), the Permittee will submit the following notifications of compliance status.

(1) Routing storage vessel or transfer rack emissions to a process or fuel gas system. The Permittee who elects to comply with 40 CFR 63.982 by routing emissions from a storage vessel to a process as specified in 40 CFR 63.984, shall submit as part of the Notification of Compliance Status the information specified in 40 CFR 63.999(b)(1)(i) and 63.999(b)(1)(ii), or 63.999(b)(1)(iii), as applicable.

(i) If storage vessels emissions are routed to a process, the Permittee shall submit the information specified in 40 CFR 63.984(b)(2) and 40 CFR 63.984(b)(3).

(ii) [Reserved]

(iii) [Reserved]

(2) [Reserved]

(3) Operating range for monitored parameters. The Permittee shall submit as part of the Notification of Compliance Status, the operating range for each monitoring parameter identified for each control, recovery, or halogen reduction device as determined pursuant to 40 CFR 63.996(c)(6). The specified operating range shall represent the conditions for which the control, recovery, or halogen reduction device is being properly operated and maintained. This report shall include the information in 40 CFR 63.999(b)(3)(i) through 63.999(b)(3)(iii), as applicable, unless the range and the operating day have been established in the operating permit.

(i) The specific range of the monitored parameter(s) for each emission point;

(ii) The rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control, recovery, or halogen reduction device, as specified in 40 CFR 63.999(b)(3)(ii)(A), 63.999(b)(3)(ii)(B), or 63.999(b)(3)(ii)(C), as applicable.

(A) If a performance test or TRE index value determination is required by a referencing subpart for a control, recovery or halogen reduction device, the range shall be based on the parameter values measured during the TRE index value determination or performance test and may be supplemented by engineering assessments and/or manufacturer's recommendations. TRE index value determinations and performance testing are not required to be conducted over the entire range of permitted parameter values.

(B) If a performance test or TRE index value determination is not required by a referencing subpart for a control, recovery, or halogen reduction device, the range may be based solely on engineering assessments and/or manufacturer's recommendations.

(C) The range may be based on ranges or limits previously established under a referencing subpart.

(iii) A definition of the source's operating day for purposes of determining daily average values of monitored parameters. The definition shall specify the times at which an operating day begins and ends.

(4) Halogen reduction device. The Permittee shall submit as part of the Notification of Compliance Status the information recorded pursuant to 40 CFR 63.998(a)(4).

(5) Alternative recordkeeping. The Permittee shall notify IDEM, OAQ in the Notification of Compliance Status if the alternative recordkeeping requirements of 40 CFR 63.998(b)(5) are being implemented. If the Notification of Compliance Status has already been submitted, the notification must be in the periodic report submitted immediately preceding implementation of the alternative, as specified in 40 CFR 63.999(c)(6)(iv).

(c) Pursuant to 40 CFR 63.999(c), the Permittee shall submit the following periodic reports.

(1) Periodic reports shall include the reporting period dates, the total source operating time for the reporting period, and, as applicable, all information

specified in 40 CFR 63.999 and in the referencing subpart, including reports of periods when monitored parameters are outside their established ranges.

(2) For closed vent systems subject to the requirements of 40 CFR 63.983, the Permittee shall submit as part of the periodic report the information specified in 40 CFR 63.999(c)(2)(i) through 63.999(c)(2)(iii), as applicable.

(i) The information recorded in 40 CFR 63.998(d)(1)(iii)(B) through 63.998(d)(1)(iii)(E);

(ii) Reports of the times of all periods recorded under 40 CFR 63.998(d)(1)(ii)(A) when the vent stream is diverted from the control device through a bypass line; and

(iii) Reports of all times recorded under 40 CFR 63.998(d)(1)(ii)(B) when maintenance is performed in car-sealed valves, when the seal is broken, when the bypass line valve position is changed, or the key for a lock-and-key type configuration has been checked out.

(3) [Reserved]

(4) [Reserved]

(5) If a control device other than a flare is used to control emissions from storage vessels, the periodic report shall describe each occurrence when the monitored parameters were outside of the parameter ranges documented in the Notification of Compliance Status in accordance with 40 CFR 63.999(b)(3). The description shall include the information specified in 40 CFR 63.999(c)(5)(i) and 63.999(c)(5)(ii).

(i) Identification of the control device for which the measured parameters were outside of the established ranges, and

(ii) The cause for the measured parameters to be outside of the established ranges.

(6) For process vents, periodic reports shall include the information specified in 40 CFR 63.999(c)(6)(i) through 63.999(c)(6)(iv).

(i) Periodic reports shall include the daily average values of monitored parameters, calculated as specified in 40 CFR 63.998(b)(3)(i) for any days when the daily average value is outside the bounds as defined in 40 CFR 63.998(c)(2)(iii) or 63.998(c)(3)(iii), or the data availability requirements defined in 40 CFR 63.999(c)(6)(i)(A) through 63.999(c)(6)(i)(D) are not met, whether these excursions are excused or unexcused excursions. For excursions caused by lack of monitoring data, the duration of periods when monitoring data were not collected shall be specified. An excursion means any of the cases listed in 40 CFR 63.999(c)(6)(i)(A) through 63.999(c)(6)(i)(C). If the Permittee elects not to retain the daily average values pursuant to 40 CFR 63.998(b)(5)(ii)(A), the Permittee shall report this in the Periodic Report.

(A) When the daily average value of one or more monitored parameters is outside the permitted range.

(B) When the period of control or recovery device operation is 4 hours or greater in an operating day and monitoring data are insufficient to constitute a valid hour of data for at least 75 percent of the operating hours.

(C) When the period of control or recovery device operation is less than 4 hours in an operating day and more than one of the hours during the period of operation does not constitute a valid hour of data due to insufficient monitoring data.

(D) Monitoring data are insufficient to constitute a valid hour of data as used in 40 CFR 63.999(c)(6)(i)(B) and 63.999(c)(6)(i)(C), if measured values are unavailable for any of the 15-minute periods within the hour.

(ii) [Reserved]

(iii) If continuous records are required, the Permittee shall specify in the monitoring plan whether the provisions of 40 CFR 63.999(c)(6)(i) and 63.999(c)(6)(ii) apply.

(iv) If the Permittee has chosen to use the alternative recordkeeping requirements of 40 CFR 63.998(b)(5), and has not notified IDEM, OAQ in the Notification of Compliance Status that the alternative recordkeeping provisions are being implemented as specified in 40 CFR 63.998(b)(5), the Permittee shall notify IDEM, OAQ in the Periodic Report submitted immediately preceding implementation of the alternative. The notifications specified in 40 CFR 63.998(b)(5)(ii) shall be included in the next Periodic Report following the identified event.

(7) [Reserved]

(d) Pursuant to 40 CFR 63.999(d) the Permittee shall request approval for monitoring alternatives.

(1) Alternatives to the continuous operating parameter monitoring and recordkeeping provisions. Requests for approval to use alternatives to continuous operating parameter monitoring and recordkeeping provisions, as provided for in 40 CFR 63.996(d)(1), shall be submitted as specified in a referencing subpart, and the referencing subpart will govern the review and approval of such requests. The information specified in paragraphs 40 CFR 63.999(d)(1)(i) and 63.999(d)(1)(ii) shall be included.

(i) A description of the proposed alternative system; and

(ii) Information justifying the Permittee's request for an alternative method, such as the technical or economic infeasibility, or the impracticality, of the regulated source using the required method.

(2) Monitoring a different parameter than those listed. Requests for approval to monitor a different parameter than those established in 40 CFR 63.996(c)(6) or to set unique monitoring parameters, as provided for in 40 CFR 63.996(d)(2), shall be submitted as specified as specified in a referencing subpart, and the referencing subpart will govern the review and approval of such requests. The information specified in 40 CFR 63.999(d)(2)(i) through 63.999(d)(2)(iii) shall be included in the request.

(i) A description of the parameter(s) to be monitored to ensure the control technology or pollution prevention measure is operated in conformance with its design and achieves the specified emission limit, percent reduction, or nominal efficiency, and an explanation of the criteria used to select the parameter(s);

(ii) A description of the methods and procedures that will be used to demonstrate that the parameter indicates proper operation of the control device, the schedule for this demonstration, and a statement that the Permittee will establish a range for the monitored parameter(s) as part of the Notification of Compliance Status if required under a referencing subpart, unless this information has already been submitted; and

(iii) The frequency and content of monitoring, recording, and reporting, if monitoring and recording is not continuous, or if reports of daily average values when the monitored parameter value is outside the established range will not be included in periodic reports under 40 CFR 63.999(c). The rationale for the proposed monitoring, recording, and reporting system shall be included.

SECTION FF 40 CFR 61, Subpart FF National Emission Standard for Benzene Waste Operations

Definitions contained in 40 CFR Part 61, Subpart FF, Section 341 are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2 7 5 (1)]

FF.1 Standards Required by 40 CFR 61, Subpart FF [326 IAC 14] [40 CFR 61.342]

(a) Pursuant to 40 CFR 61.342(a), the Permittee of a facility at which the total annual benzene quantity from facility waste is less than 10 megagrams per year (Mg/yr) (11 ton/yr) shall be exempt from the requirements of 40 CFR 61.342(b) and 61.342(c). The total annual benzene quantity from facility waste is the sum of the annual benzene quantity for each waste stream at the facility that has a flow weighted annual average water content greater than 10 percent or that is mixed with water, or other wastes, at any time and the mixture has an annual average water content greater than 10 percent. The benzene quantity in a waste stream is to be counted only once without multiple counting if other waste streams are mixed with or generated from the original waste stream. Other specific requirements for calculating the total annual benzene waste quantity are as follows:

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) The total annual benzene quantity is determined based upon the quantity of benzene in the waste before any waste treatment occurs to remove the benzene except as specified in 40 CFR 61.355(c)(1)(i)(A) through 61.355(c)(1)(i)(C).

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) Pursuant to 40 CFR 61.342(g), compliance with 40 CFR Part 61, Subpart FF will be determined by review of the Permittee's records and results from tests and inspections using methods and procedures specified in 40 CFR 61.355.

(h) [Reserved]

Compliance Determination Requirements

FF.2 Test Methods, Procedures and Compliance Provisions for 40 CFR 61, Subpart FF [326 IAC 14] [40 CFR 61.355]

(a) Pursuant to 40 CFR 61.355(a), the Permittee shall determine the total annual benzene quantity from facility waste by the following procedure:

(1) For each waste stream subject to 40 CFR Part 61, Subpart FF having a flow weighted annual average water content greater than 10 percent water, on a volume basis as total water, or is mixed with water or other wastes at any time and the resulting mixture has an annual average water content greater than 10 percent as specified in 40 CFR 61.342(a), the Permittee shall:

(i) Determine the annual waste benzene waste quantity for each waste stream using the procedures specified in 40 CFR 61.355.

(ii) Determine the flow weighted annual average benzene concentration for each waste stream using the procedures specified in 40 CFR 61.355(c).

(iii) Calculate the annual benzene quantity for each waste stream by multiplying the annual waste quantity of the waste stream times the flow weighted annual average benzene concentration.

(2) Total annual benzene quantity from facility waste is calculated by adding together the annual benzene quantity for each waste stream generated during the year and the annual benzene quantity for each process unit turnaround waste annualized according to 40 CFR 61.355(b)(4).

(3) [Reserved]

(4) If the total annual benzene quantity from facility waste is less than 11 ton/yr but is equal to or greater than 1.1 ton/yr, then the Permittee shall:

(i) Comply with the recordkeeping requirements in 40 CFR 61.356 and reporting requirements in 40 CFR 61.357; and

(ii) Repeat the determination of total annual benzene quantity from facility waste at least once per year and whenever there is a change in the process generating the waste that could cause the total annual benzene quantity from facility waste to increase to 11 ton/yr or more.

(5) If the total annual benzene quantity from facility waste is less than 1.1 ton/yr, then the Permittee shall:

(i) Comply with the recordkeeping requirements in 40 CFR 61.356 and reporting requirements in 40 CFR 61.357.

(ii) Repeat the determination of total annual benzene quantity from facility waste whenever there is a change in the process generating the waste that could cause the total annual benzene quantity from facility waste to increase to 1.1 ton/yr or more.

(6) [Reserved]

(b) Pursuant to 40 CFR 61.355(b) and for purposes of the calculation required by 40 CFR 61.355(a), the Permittee shall determine the annual waste quantity at the point of waste generation, by one of the following methods:

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) The determination of annual waste quantity for each process unit turnaround waste generated only at 2 year or greater intervals, may be made by dividing the total quantity of waste generated during the most recent process unit turnaround by the time period (in the nearest tenth of a year) between the turnaround resulting in generation of the waste and the most recent preceding process turnaround for the unit. The resulting annual waste quantity shall be included in the calculation of the annual benzene quantity as provided in 40 CFR

61.355(a)(1)(iii) for the year in which the turnaround occurs and for each subsequent year until the unit undergoes the next process turnaround. For estimates of total annual benzene quantity as specified in the 90 day report, required under 40 CFR 61.357(a)(1), the Permittee shall estimate the waste quantity generated during the most recent turnaround, and the time period between turnarounds in accordance with good engineering practices. If the Permittee chooses not to annualize process unit turnaround waste, as specified in 40 CFR 61.355(b)(4), then the process unit turnaround waste quantity shall be included in the calculation of the annual benzene quantity for the year in which the turnaround occurs.

(5) Select the highest annual quantity of waste managed from historical records representing the most recent 5 years of operation;

(6) Use the maximum design capacity of the waste management unit; or

(7) Use measurements that are representative of maximum waste generation rates;

(c) Pursuant to 40 CFR 61.355(c) and for the purposes of the calculation required by 40 CFR 61.355(a), the Permittee shall determine the flow weighted annual average benzene concentration in a manner that meets the requirements given in 40 CFR 61.355(c)(1) using either of the methods given in 40 CFR 61.355(c)(2) and 40 CFR 61.355(c)(3):

(1) The determination of flow weighted annual average benzene concentration shall meet all of the following criteria:

(i) The determination shall be made at the point of waste generation except for the specific cases given in 40 CFR 61.355(c)(1)(i)(A) through 61.355(c)(1)(i)(D).

(A) [Reserved]

(B) [Reserved]

(C) [Reserved]

(D) The determination of flow weighted annual average benzene concentration for process unit turnaround waste shall be made using either of the methods given in 40 CFR 61.355(c)(2) or 61.355(c)(3). The resulting flow weighted annual average benzene concentration shall be included in the calculation of annual benzene quantity as provided in 40 CFR 61.355(a)(1)(iii) for the year in which the turnaround occurs and for each subsequent year until the unit undergoes the next process unit turnaround.

(ii) Volatilization of the benzene by exposure to air shall not be used in the determination to reduce the benzene concentration.

(iii) Mixing or diluting the waste stream with other wastes or other materials shall not be used in the determination to reduce the benzene concentration.

(iv) The determination shall be made prior to any treatment of the waste that removes benzene.

(v) For wastes with multiple phases, the determination shall provide the weighted average benzene concentration based on the benzene

concentration in each phase of the waste and the relative proportion of the phases.

(2) Knowledge of the waste. The Permittee shall provide sufficient information to document the flow weighted annual average benzene concentration of each waste stream. Examples of information that could constitute knowledge include material balances, records of chemicals purchases, or previous test results provided the results are still relevant to the current waste stream conditions. If test data are used, then the Permittee shall provide documentation describing the testing protocol and the means by which sampling variability and analytical variability were accounted for in the determination of the flow weighted annual average benzene concentration for the waste stream. When the Permittee and IDEM, OAQ do not agree on determinations of the flow weighted annual average benzene concentration based on knowledge of the waste, the procedures under 40 CFR 61.355(c)(3) shall be used to resolve the disagreement.

(3) Measurements of the benzene concentration in the waste stream in accordance with the following procedures:

(i) The Permittee shall collect a minimum of three representative samples from each waste stream. Where feasible, samples shall be taken from an enclosed pipe prior to the waste being exposed to the atmosphere.

(ii) For waste in enclosed pipes, the following procedures shall be used:

(A) Samples shall be collected prior to the waste being exposed to the atmosphere in order to minimize the loss of benzene prior to sampling.

(B) A static mixer shall be installed in the process line or in a by pass line unless the Permittee demonstrates that installation of a static mixer in the line is not necessary to accurately determine the benzene concentration of the waste stream.

(C) The sampling tap shall be located within two pipe diameters of the static mixer outlet.

(D) Prior to the initiation of sampling, sample lines and cooling coil shall be purged with at least four volumes of waste.

(E) After purging, the sample flow shall be directed to a sample container and the tip of the sampling tube shall be kept below the surface of the waste during sampling to minimize contact with the atmosphere.

(F) Samples shall be collected at a flow rate such that the cooling coil is able to maintain a waste temperature less than 10^0 C (50^0 F).

(G) After filling, the sample container shall be capped immediately (within 5 seconds) to leave a minimum headspace in the container.

(H) The sample containers shall immediately be cooled and maintained at a temperature below 10^0 C (50^0 F) for transfer to the laboratory.

(iii) When sampling from an enclosed pipe is not feasible, a minimum of three representative samples shall be collected in a manner to minimize exposure of the sample to the atmosphere and loss of benzene prior to sampling.

(iv) Each waste sample shall be analyzed using one of the following test methods for determining the benzene concentration in a waste stream:

(A) Method 8020, Aromatic Volatile Organics, in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication No. SW 846 (incorporation by reference as specified in 40 CFR 61.18 of 40 CFR Part 61);

(B) Method 8021, Volatile Organic Compounds in Water by Purge and Trap Capillary Column Gas Chromatography with Photoionization and Electrolytic Conductivity Detectors in Series in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication No. SW 846 (incorporation by reference as specified in 40 CFR 61.18 of 40 CFR Part 61);

(C) Method 8240, Gas Chromatography/Mass Spectrometry for Volatile Organics in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication No. SW 846 (incorporation by reference as specified in §61.18 of 40 CFR Part 61);

(D) Method 8260, Gas Chromatography/Mass Spectrometry for Volatile Organics: Capillary Column Technique in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication No. SW 846 (incorporation by reference as specified in §61.18 of 40 CFR Part 61);

(E) Method 602, Purgeable Aromatics, as described in 40 CFR Part 136, Appendix A, Test Procedures for Analysis of Organic Pollutants, for wastewaters for which this is an approved EPA methods; or

(F) Method 624, Purgeables, as described in 40 CFR Part 136, Appendix A, Test Procedures for Analysis of Organic Pollutants, for wastewaters for which this is an approved EPA method.

(v) The flow weighted annual average benzene concentration shall be calculated by averaging the results of the sample analyses as follows:

$$\bar{C} = \frac{1}{Q_t} \times \sum_{i=1}^{N} (Q_i)(C_i)$$

Where:
C = Flow weighted annual average benzene concentration for waste stream, ppmw.
Qt = Total annual waste quantity for waste stream, kg/yr (lb/yr).
N = Number of waste samples (at least 3).
Qi = Annual waste quantity for waste stream represented by Ci, kg/yr (lb/yr).
Ci = Measured concentration of benzene in waste sample i, ppmw.

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

(i) [Reserved]

(j) [Reserved]

(k) [Reserved]

Recordkeeping and Reporting Requirements [326 IAC 2 7 5(3)] [326 IAC 2 7 19]

FF.3 Recordkeeping Requirements for 40 CFR 61, Subpart FF [325 IAC 14] [40 CFR 61.356]

(a) The Permittee of a facility subject to 40 CFR 61, Subpart FF shall comply with the recordkeeping requirements in 40 CFR 61.356. Each record shall be maintained in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified.

(b) Pursuant to 40 CFR 61.356(b), the Permittee shall maintain records that identify each waste stream at the facility subject to 40 CFR 61, Subpart FF, and indicate whether or not the waste stream is controlled for benzene emissions in accordance with 40 CFR Part 61, Subpart FF.

(1) For each waste stream not controlled for benzene emissions, the records shall include all test results, measurements, calculations, and other documentation used to determine the following information for the waste stream: waste stream identification, water content, whether or not the waste stream is a process wastewater stream, annual waste quantity, range of benzene concentrations, annual average flow weighted benzene concentration, and annual benzene quantity.

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) For each facility where the annual waste quantity for process unit turnaround waste is determined in accordance with 40 CFR 61.355(b)(5), the records shall include all test results, measurements, calculations, and other documentation used to determine the following information: identification of each process unit at the facility that undergoes turnarounds, the date of the most recent turnaround for each process unit, identification of each process unit turnaround waste, the water content of each process unit turnaround waste, the annual waste quantity determined in accordance with 40 CFR 61.355(b)(5), the range of benzene concentrations in the waste, the annual average flow weighted benzene concentration of the waste, and the annual benzene quantity calculated in accordance with 40 CFR 61.355(a)(1)(iii).

(6) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

(i) [Reserved]

(j) [Reserved]

(k) [Reserved]

(l) [Reserved]

(m) [Reserved]

(n) [Reserved]

FF.4 Reporting Requirements for 40 CFR 61, Subpart FF [326 IAC 14] [40 CFR 61.357]

(a) Pursuant to 40 CFR 61.357(a), the Permittee of a chemical plant, petroleum refinery, coke by product recovery plant, and any facility managing wastes from these industries shall submit to the US EPA and IDEM, OAQ by the initial startup for a new source with an initial startup after the effective date, a report that summarizes the regulatory status of each waste stream subject to 40 CFR 61.342 and is determined by the procedures specified in 40 CFR 61.355(c) to contain benzene. The report shall include the following information:

(1) Total annual benzene quantity from facility waste determined in accordance with 40 CFR 61.355(a).

(2) A table identifying each waste stream and whether or not the waste stream will be controlled for benzene emissions in accordance with the requirements of 40 CFR Part 61, Subpart FF.

(3) For each waste stream identified as not being controlled for benzene emissions in accordance with the requirements of 40 CFR Part 61, Subpart FF the following information shall be added to the table:

(i) Whether or not the water content of the waste stream is greater than 10 percent;

(ii) Whether or not the waste stream is a process wastewater stream, product tank drawdown, or landfill leachate;

(iii) Annual waste quantity for the waste stream;

(iv) Range of benzene concentrations for the waste stream;

(v) Annual average flow weighted benzene concentration for the waste stream; and

(vi) Annual benzene quantity for the waste stream.

(4) The information required in 40 CFR 61.357(a)(1), (2), and (3) should represent the waste stream characteristics based on current configuration and operating conditions. The Permittee only needs to list in the report those waste streams that contact material containing benzene. The report does not need to include a description of the controls to be installed to comply with the standard or other information required in 40 CFR 61.10(a).

(b) Pursuant to 40 CFR 61.357(b), if the total annual benzene quantity from facility waste is less than 1 Mg/yr (1.1 ton/yr), then the Permittee shall submit to IDEM, OAQ a report that updates the information listed in 40 CFR 61.357(a)(1) through 61.357(a)(3) whenever there is a change in the process generating the waste stream that could cause the total annual benzene quantity from facility waste to increase to 1 Mg/yr (1.1 ton/yr) or more.

(c) Pursuant to 40 CFR 61.357(c), if the total annual benzene quantity from facility waste is less than 10 Mg/yr (11 ton/yr) but is equal to or greater than 1 Mg/yr (1.1 ton/yr), then the Permittee shall submit to IDEM, OAQ a report that updates the information listed in 40 CFR 61.357(a)(1) through 61.357(a)(3). The report shall be submitted annually and whenever there is a change in the process generating the waste stream that could cause the total annual benzene quantity from facility waste to increase to 10 Mg/yr (11 ton/yr) or more. If the information in the annual report required by 40 CFR 61.357(a)(1) through 61.357(a)(3) is not changed in the following year, the Permittee may submit a statement to that effect.

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

SECTION GG 40 CFR 60, Subpart VV - Standards of Performance for Equipment Leaks of VOC in the Synthetic Organic Chemicals Manufacturing Industry

Definitions contained in 40 CFR Part 60, Subpart VV, Section 481 are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2-7-5(1)]

GG.1 Standards: Pumps in Light Liquid Service [326 IAC 12][40 CFR 60.482-2, Subpart VV]

(a) Pursuant to 40 CFR 60.482-2(a), each pump in light liquid service shall:

(1) Be monitored monthly to detect leaks by the methods specified in 40 CFR 60.485(b), except as provided in 40 CFR 60.482–1(c), 40 CFR 60.482–2(d), 40 CFR 60.482–2(e), and 40 CFR 60.482–2(f).

(2) Be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal.

(b) Pursuant to 40 CFR 60.482-2(b):

(1) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(2) If there are indications of liquids dripping from the pump seal, a leak is detected.

(c) Pursuant to 40 CFR 60.482-2(c):

(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 60.482-9.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(d) Pursuant to 40 CFR 60.482-2(d), each pump equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of 40 CFR 60.482-2(a), provided the following requirements are met:

(1) Each dual mechanical seal system is:

(i) Operated with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure; or

(ii) Equipment with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482–10; or

(iii) Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.

(2) The barrier fluid system is in heavy liquid service or is not in VOC service.

(3) Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(4) Each pump is checked by visual inspection, each calendar week, for indications of liquids dripping from the pump seals.

(5) The following requirements are met:

(i) Each sensor as described in 40 CFR 60.482-2(d)(3) is checked daily or is equipped with an audible alarm;

(ii) The Permittee determines, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(6) (i) Pursuant to 40 CFR 60.482-2(d)(6)(i), if there are indications of liquids dripping from the pump seal or the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined in 40 CFR 60.482-2(d)(5)(ii), a leak is detected.

(i) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 60.482-9.

(iii) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(e) Pursuant to 40 CFR 60.482-2(e), any pump that is designated, as described in 40 CFR 60.486(e)(1) and 60.486(e)(2), for no detectable emission, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements 40 CFR 60.486(c), and 60.486(d) if the pump:

(1) Has no externally actuated shaft penetrating the pump housing,

(2) Is demonstrated to be operating with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background as measured by the methods specified in 40 CFR 60.485(c), and

(3) Is tested for compliance with 40 CFR 60.482-2(e)(2) initially upon designation, annually, and at other times requested by the US EPA and IDEM, OAQ.

(f) Pursuant to 40 CFR 60.482-2(f), if any pump is equipped with a closed vent system capable of capturing and transporting any leakage from the seal or seals to a process or to a fuel gas system or to a control device that complies with the requirements of 40 CFR 60.482-10, it is exempt from 40 CFR 60.482-2(a) through 60.482-2(e).

(g) Pursuant to 40 CFR 60.482-2(g), any pump that is designated, as described in 40 CFR 60.486(f)(1), as an unsafe-to-monitor pump is exempt from the monitoring and inspection requirements of 40 CFR 60.482-2(a) and 60.482-2(d)(4) through 60.482-2(d)(6) if:

(1) The Permittee demonstrates that the pump is unsafe-to-monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 60.482-2(a); and

(2) The Permittee has a written plan that requires monitoring of the pump as frequently as practicable during safe-to-monitor times but not more frequently than the periodic monitoring schedule otherwise applicable, and repair of the equipment according to the procedures in 40 CFR 60.482-2(c) if a leak is detected.

(h) Pursuant to 40 CFR 60.482 2(h), any pump that is located within the boundary of an unmanned plant site is exempt from the weekly visual inspection requirement of 40 CFR 60.482-2(a)(2), and 40 CFR 60.482-2(d)(4), and the daily requirements of 40 CFR

60.482-2(d)(5), provided that each pump is visually inspected as often as practicable and at least monthly.

GG.2 Standards: Compressors [326 IAC 12][40 CFR 60.482-3, Subpart VV]

(a) Pursuant to 40 CFR 60.482-3(a), each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of VOC to the atmosphere, except as provided in 40 CFR 60.482-1(c), 60.482 3 (h), and 60.482 3(i).

(b) Pursuant to 40 CFR 60.482-3(b), each compressor seal system as required in 40 CFR 60.482-3(a) shall be:

(1) Operated with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or

(2) Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10; or

(3) Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.

(c) Pursuant to 40 CFR 60.482-3(c), the barrier fluid system shall be in heavy liquid service or shall not be in VOC service.

(d) Pursuant to 40 CFR 60.482-3(d), each barrier fluid system as described in 40 CFR 60.482-3(a) shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both.

(e) (1) Pursuant to 40 CFR 60.482-3(e)(1), each sensor as required in 40 CFR 60.482-3(d) shall be checked daily or shall be equipped with an audible alarm.

(2) The Permittee shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(f) Pursuant to 40 CFR 60.482-3(f), if the sensor indicates failure of the seal system, the barrier system, or both based on the criterion determined under 40 CFR 60.482-3(e)(2), a leak is detected.

(g) (1) Pursuant to 40 CFR 60.482-3(g)(1), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 60.482-9.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(h) Pursuant to 40 CFR 60.482-3(h), a compressor is exempt from the requirements of 40 CFR 60.482-3(a) and 40 CFR 60.482-3(b), if it is equipped with a closed vent system to capture and transport leakage from the compressor drive shaft back to a process or fuel gas system or to a control device that complies with the requirements of 40 CFR 60.482-10, except as provided in 40 CFR 60.482-3(i).

(i) Pursuant to 40 CFR 60.482-3(i), any compressor that is designated, as described in 40 CFR 60.486(e)(1) and 40 CFR 60.486(e)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of 40 CFR 60.482-3(a) through 40 CFR 60.482-3(h) if the compressor:

(1) Is demonstrated to be operating with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the methods specified in 40 CFR 60.485(c); and

(2) Is tested for compliance with 40 CFR 60.482-3(i)(1) initially upon designation, annually, and at other times requested by the US EPA and IDEM, OAQ.

(j) Pursuant to 40 CFR 60.482-3(j), any existing reciprocating compressor in a process unit which becomes an affected facility under 40 CFR 60.14 or 40 CFR 60.15 is exempt from 40 CFR 60.482(a), 60.482(b), 60.482(c), 60.482(d), 60.482(e), and 60.482(h), provided the Permittee demonstrates that recasting the distance piece or replacing the compressor are the only options available to bring the compressor into compliance with the provisions of 40 CFR 60.482(a), 60.482(b), 60.482(c), 60.482(d), 60.482(e), and 60.482(h).

GG.3 Standards: Pressure Relief Devices in Gas/Vapor Service [326 IAC 12][40 CFR 60.482-4, Subpart VV]

(a) Pursuant to 40 CFR 60.482-4(a), except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as determined by the methods specified in 40 CFR 60.485(c).

(b) (1) Pursuant to 40 CFR 60.482-4(b)(1), after each pressure release, the pressure relief device shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as soon as practicable, but no later than 5 calendar days after the pressure release, except as provided in 40 CFR 60.482-9.

(2) No later than 5 calendar days after the pressure release, the pressure relief device shall be monitored to confirm the conditions of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, by the methods specified in 40 CFR 60.485(c).

(c) Pursuant to 40 CFR 60.482-4(c), any pressure relief device that is routed to a process or fuel gas system or equipped with a closed vent system capable of capturing and transporting leakage through the pressure relief device to a control device as described in 40 CFR 60.482-10 is exempted from the requirements of 40 CFR 60.482-4(a) and 60.482-4(b).

(d) (1) Pursuant to 40 CFR 60.482-4(d)(1), any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of 40 CFR 60.482-4(a) and 40 CFR 60.482-4(b), provided the Permittee complies with the requirements in 40 CFR 60.482-4(d)(2).

(2) After each pressure release, a new rupture disk is installed upstream of the pressure relief device as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 60.482-9.

GG.4 Standards: Sampling Connection Systems [326 IAC 12][40 CFR 60.482-5, Subpart VV]

(a) Pursuant to 40 CFR 60.482-5(a), each sampling connection system shall be equipped with a closed-purged, closed-loop, or closed-vent system except as provided in 40 CFR 60.482-1(c). Gases displaced during filling of the sample container are not required to be collected or captured.

(b) Pursuant to 40 CFR 60.482-5(b), each closed-purge, closed-loop, or closed-vent system as required in 40 CFR 60.482-5(a) shall comply with the following requirements:

(1) Return the purged process fluid directly to the process line; or

(2) Collect and recycle the purged process fluid to a process; or

(3) Be designed and operated to capture and transport all the purged process fluid to a control device that complies with the requirements of 40 CFR 60.482-10; or

(4) Collect, store, and transport the purged process fluid to any of the following systems or facilities:

(i) A waste management unit as defined in 40 CFR 63.111, if the waste management unit is subject to, and operated in compliance with the provisions of 40 CFR Part 63, Subpart G, applicable to Group 1 wastewater streams;

(ii) A treatment, storage, or disposal facility subject to regulation under 40 CFR Part 262, 264, 265, or 266; or

(iii) A facility permitted, licensed, or registered by a State to manage municipal or industrial solid waste, if the process fluids are not hazardous waste as defined in 40 CFR Part 261.

(c) Pursuant to 40 CFR 60.482-5(c), in situ sampling systems and sampling systems without purges are exempt from the requirements of 40 CFR 60.482-5(a) and 40 CFR 60.482-5(b).

GG.5 Standards: Open-Ended Valves or Lines [326 IAC 12][40 CFR 60.482-6, Subpart VV]

(a) (1) Pursuant to 40 CFR 60.482-6(a)(1), each open ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve, except as provided in 40 CFR 60.482–1(c).

(2) The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring process fluid flow through the open ended valve or line.

(b) Pursuant to 40 CFR 60.482-6(b), each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed.

(c) Pursuant to 40 CFR 60.482-6(c), when a double block-and-bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with 40 CFR 60.482-6(a) at all other times.

(d) Pursuant to 40 CFR 60.482-6(d), open-ended valves or lines in an emergency shutdown system which are designed to open automatically in the event of a process upset are exempt from the requirements of 40 CFR 60.482-6(a), 60.482-6(b) and 60.482-6(c).

(e) Pursuant to 40 CFR 60.482-6(e), open-ended valves or lines containing materials which would autocatalytically polymerize or would present an explosion, serious overpressure, or other safety hazard if capped or equipped with a double block and bleed system as specified in 40 CFR 60.482-6(a) through 40 CFR 60.482-6(c) are exempt from the requirements of 40 CFR 60.482-6(a) through 40 CFR 60.482-6(c).

GG.6 Standards: Valves in Gas/Vapor Service and in Light Liquid Service [326 IAC 12][40 CFR 60.482-7, Subpart VV]

(a) Pursuant to 40 CFR 60.482-7(a), each valve shall be monitored monthly to detect leaks by the methods specified in 40 CFR 60.485(b) and shall comply with 40 CFR 60.482-7(b) through 40 CFR 60.482-7(e), except as provided in 40 CFR 60.482-7(f), 40 CFR 60.482-7(g), and 40 CFR 60.482-7(h), 40 CFR 60.483–1, 2, and 40 CFR 60.482–1(c).

(b) Pursuant to 40 CFR 60.482-7(b), if an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c) (1) Pursuant to 40 CFR 60.482-7(c)(1), any valve for which a leak is not detected for 2 successive months may be monitored the first month of every quarter, beginning with the next quarter, until a leak is detected.

(2) If a leak is detected, the valve shall be monitored monthly until a leak is not detected for 2 successive months.

(d) (1) Pursuant to 40 CFR 60.482-7(d)(1), when a leak is detected, it shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 60.482-9.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(e) Pursuant to 40 CFR 60.482-7(e), first attempts at repair include, but are not limited to, the following best practices where practicable:

(1) Tightening of bonnet bolts;

(2) Replacement of bonnet bolts;

(3) Tightening of packing gland nuts;

(4) Injection of lubricant into lubricated packing.

(f) Pursuant to 40 CFR 60.482-7(f), any valve that is designated, as described in 40 CFR 60.486(e)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of 40 CFR 60.482-7(a) if the valve:

(1) Has no external actuating mechanism in contact with the process fluid,

(2) Is operated with emissions less than 500 ppm above background as determined by the method specified in 40 CFR 60.485(c), and

(3) Is tested for compliance with 40 CFR 60.482-7(f)(2) initially upon designation, annually, and at other times requested by the US EPA and IDEM, OAQ.

(g) Pursuant to 40 CFR 60.482-7(g), any valve that is designated, as described in 40 CFR 60.486(f)(1), as an unsafe-to-monitor valve is exempt from the requirements of 40 CFR 60.482-7(a) if:

(1) The Permittee demonstrates that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 60.482-7(a), and

(2) The Permittee of the valve adheres to a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times.

(h) Pursuant to 40 CFR 60.482-7(h), any valve that is designated, as described in 40 CFR 60.486(f)(2), as a difficult-to-monitor valve is exempt from the requirements of 40 CFR 60.482-7(a) if:

(1) The Permittee demonstrates that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface.

(2) The process unit within which the valve is located either becomes an affected facility through 40 CFR 60.14 or 40 CFR 60.15 or the Permittee designates less than 3.0 percent of the total number of valves as difficult-to-monitor, and

(3) The Permittee follows a written plan that requires monitoring of the valve at least once per calendar year.

GG.7 Standards: Pumps and Valves in Heavy Liquid Service, Pressure Relief Devices in Light Liquid or Heavy Liquid Service, and Connectors [326 IAC 12][40 CFR 60.482-8, Subpart VV]

(a) Pursuant to 40 CFR 60.482-8(a), if evidence of a potential leak is found by visual, audible, olfactory, or any other detection method at pumps and valves in heavy liquid service, pressure relief devices in light liquid or heavy liquid service, and connectors, the Permittee shall follow either one of the following procedures:

(1) The Permittee shall monitor the equipment within 5 days by the method specified in 40 CFR 60.485(b) and shall comply with the requirements of 40 CFR 60.482-8(b) through 40 CFR 60.482-8(d).

(2) The Permittee shall eliminate the visual, audible, olfactory, or other indication of a potential leak.

(b) Pursuant to 40 CFR 60.482-8(b), if an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c) (1) Pursuant to 40 CFR 60.482-8(c)(1), when a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in 40 CFR 60.482-9.

(2) The first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(d) Pursuant to 40 CFR 60.482-8(d), first attempts at repair include, but are not limited to, the best practices described under 40 CFR 60.482-7(e).

GG.8 Standards: Closed Vent Systems and Control Devices [326 IAC 12][40 CFR 60.482-10, Subpart VV]

(a) Pursuant to 40 CFR 60.482-10(a), the Permittee of closed vent systems and control devices used to comply with provisions of 40 CFR 60, Subpart VV shall comply with the provisions 40 CFR 60.482-10, Subpart VV.

(b) Pursuant to 40 CFR 60.482-10(b), vapor recovery systems (for example, condensers and absorbers) shall be designed and operated to recover the VOC emissions vented to them with an efficiency of 95 percent or greater, or to an exit concentration of 20 parts per million by volume, whichever is less stringent.

(c) Pursuant to 40 CFR 60.482-10(c), enclosed combustion devices shall be designed and operated to reduce the VOC emissions vented to them with an efficiency of 95 percent or greater, or to an exit concentration of 20 parts per million by volume, on a dry basis, corrected to 3 percent oxygen, whichever is less stringent or to provide a minimum residence time of 0.75 seconds at a minimum temperature of 816 °C.

(d) [Reserved]

(e) Pursuant to 40 CFR 60.482-10(e), for control devices used to comply with the provisions of 40 CFR 60, Subpart VV, the Permittee shall monitor these control devices to ensure that they are operated and maintained in conformance with their designs.

(f) Pursuant to 40 CFR 60.482-10(f), except as provided in 40 CFR 60.482-10(i) through 40 CFR 60.482-10(k), each closed vent system shall be inspected according to the procedures and schedule specified below:

(1) If the vapor collection system or closed vent system is constructed of hard-piping, the Permittee shall comply with the requirements specified in 40 CFR 60.482-10(f)(1)(i) and 40 CFR 60.482-10(f)(1)(ii):

(i) Conduct an initial inspection according to the procedures in 40 CFR 60.485(b); and

(ii) Conduct annual visual inspections for visible, audible, or olfactory indications of leaks.

(2) If the vapor collection system or closed vent system is constructed of ductwork, the Permittee shall:

(i) Conduct an initial inspection according to the procedures in 40 CFR 60.485(b); and

(ii) Conduct annual inspections according to the procedures in 40 CFR 60.485(b).

(g) Pursuant to 40 CFR 60.482-10(g), leaks, as indicated by an instrument reading greater than 500 parts per million by volume above background or by visual inspections, shall be repaired as soon as practicable except as provided in 40 CFR 60.482-10(h).

(1) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected.

(2) Repair shall be completed no later than 15 calendar days after the leak is detected.

(h) Pursuant to 40 CFR 60.482-10(h), delay of repair of a closed vent system for which leaks have been detected is allowed if the repair is technically infeasible without a process unit shutdown or if the Permittee determines that emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair. Repair of such equipment shall be complete by the end of the next process unit shutdown.

(i) Pursuant to 40 CFR 60.482-10(i), if a vapor collection system or closed vent system is operated under a vacuum, it is exempt from the inspection requirements of 40 CFR 60.482-10(f)(1)(i) and 40 CFR 60.482-10(f)(2).

(j) Pursuant to 40 CFR 60.482-10(j), Any parts of the closed vent system that are designated, as described in 40 CFR 60.482-10(l)(1), as unsafe to inspect are exempt from the inspection requirements of 40 CFR 60.482-10(f)(1)(i) and 60.482-10(f)(2) if they comply with the requirements specified in 40 CFR 60.482-10(j)(1) and 60.482-10(j)(2):

(1) The Permittee determines that the equipment is unsafe to inspect because inspecting personnel would be exposed to an imminent or potential danger as a consequence of complying with 40 CFR 60.482-10(f)(1)(i) and 40 CFR 60.482-10(f)(2); and

(2) The Permittee has a written plan that requires inspection of the equipment as frequently as practicable during safe-to-inspect times.

(k) Pursuant to 40 CFR 60.482-10(k), any parts of the closed vent system that are designated, as described in 40 CFR 60.482-10(l)(2), as difficult to inspect are exempt from the inspection requirements of 40 CFR 60.482-10(f)(1)(i) and 60.482-10(f)(2) if they comply with the requirements specified below:

(1) The Permittee determines that the equipment cannot be inspected without elevating the inspecting personnel more than 2 meters above a support surface; and

(2) The process unit within which the closed vent system is located becomes an affected facility through 40 CFR 60.14 and 60.15, or the Permittee designates less than 3.0 percent of the total number of closed vent system equipment as difficult to inspect; and

(3) The Permittee has a written plan that requires inspection of the equipment at least once every 5 years. A closed vent system is exempt from inspection if it is operated under a vacuum.

(l) [Applicable under GG.14]

(m) Pursuant to 40 CFR 60.482-10(m), closed vent systems and control devices used to comply with provisions of 40 CFR 60, Subpart VV shall be operated at all times when emissions may be vented to them.

GG.9 Standards: Delay of Repair [326 IAC 12][40 CFR 60.482-9, Subpart VV]

(a) Pursuant to 40 CFR 60.482-9(a), delay of repair of equipment for which leaks have been detected will be allowed if repair within 15 days is technically infeasible without a process unit shutdown. Repair of this equipment shall occur before the end of the next process unit shutdown.

(b) Pursuant to 40 CFR 60.482-9(b), delay of repair of equipment will be allowed for equipment which is isolated from the process and which does not remain in VOC service.

(c) Pursuant to 40 CFR 60.482-9(c), delay of repair for valves will be allowed if:

(1) The Permittee demonstrates that emissions of purged material resulting from immediate repair are greater than the fugitive emissions likely to result from delay of repair, and

(2) When repair procedures are effected, the purged material is collected and destroyed or recovered in a control device complying with 40 CFR 60.482-10.

(d) Pursuant to 40 CFR 60.482-9(d), delay of repair for pumps will be allowed if:

(1) Repair requires the use of a dual mechanical seal system that includes a barrier fluid system, and

(2) Repair is completed as soon as practicable, but not later than 6 months after the leak was detected.

(e) Pursuant to 40 CFR 60.482-9(e), delay of repair beyond a process unit shutdown will be allowed for a valve, if valve assembly replacement is necessary during the process unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond

the next process unit shutdown will not be allowed unless the next process unit shutdown occurs sooner than 6 months after the first process unit shutdown.

GG.10 Standards: General [326 IAC 12][40 CFR 60.482 1, Subpart VV]

(a) Pursuant to 40 CFR 60.482 1(a), each Permittee subject to the provisions of 40 CFR Part 60, Subpart VV shall demonstrate compliance with the requirements of 40 CFR 60.482–1 through 60.482–10 or 40 CFR 60.480(e) for all equipment.

(b) Pursuant to 40 CFR 60.482 1(b), compliance with 60.482–1 through 60.482–10 will be determined by review of records and reports, review of performance test results, and inspection using the methods and procedures specified in 40 CFR 60.485.

(c) (1) Pursuant to 40 CFR 60.482 1(c)(1), a Permittee may request a determination of equivalence of a means of emission limitation to the requirements of 40 CFR 60.482–2, 60.482–3, 60.482–5, 60.482–6, 60.482–7, 60.482–8, and 60.482–10 as provided in 60.484.

(2) If IDEM, OAQ makes a determination that a means of emission limitation is at least equivalent to the requirements of 40 CFR 60.482–2, 60.482–3, 60.482–5, 60.482–6, 60.482–7, 60.482–8, or 60.482–10, a Permittee shall comply with the requirements of that determination.

(d) Pursuant to 40 CFR 60.482 1(d), equipment that is in vacuum service is excluded from the requirements of 40 CFR 60.482–2 through 60.482–10 if it is identified as required in 40 CFR 60.486(e)(5).

GG.11 Alternative Standards: Valves-Allowable Percentage of Valves Leaking.
[326 IAC 12][40 CFR 60.483-1, Subpart VV]

(a) Pursuant to 40 CFR 60.483-1(a), a Permittee may elect to comply with an allowable percentage of valves leaking of equal to or less than 2.0 percent.

(b) Pursuant to 40 CFR 60.483-1(b), the following requirements shall be met if a Permittee wishes to comply with an allowable percentage of valves leaking:

(1) [Reserved]

(2) A performance test as specified in 40 CFR 60.483-1(c) shall be conducted initially upon designation, annually, and at other times requested by IDEM, OAQ.

(3) If a valve leak is detected, it shall be repaired in accordance with 40 CFR 60.482–7(d) and 60.482–7(e).

(c) Pursuant to 40 CFR 60.483-1(c), performance tests shall be conducted in the following manner:

(1) All valves in gas/vapor and light liquid service within the affected facility shall be monitored within 1 week by the methods specified in 40 CFR 60.485(b).

(2) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(3) The leak percentage shall be determined by dividing the number of valves for which leaks are detected by the number of valves in gas/vapor and light liquid service within the affected facility.

(d) Pursuant to 40 CFR 60.483-1(d), a Permittee who elect to comply with this alternative standard shall not have an affected facility with a leak percentage greater than 2.0 percent.

GG.12 Alternative Standards: Valves Skip Period Leak Detection and Repair [326 IAC 12][40 CFR 60.483-2, Subpart VV]

(a) (1) Pursuant to 40 CFR 60.483-2(a)(1), a Permittee may elect to comply with one of the alternative work practices specified in 40 CFR 60.483-2(b)(2) and 60.483-2(b)(3).

(2) [Reserved]

(b) (1) Pursuant to 40 CFR 60.483-2(b)(1), a Permittee shall comply initially with the requirements for valves in gas/vapor service and valves in light liquid service, as described in 40 CFR 60.482-7.

(2) After 2 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0, a Permittee may begin to skip 1 of the quarterly leak detection periods for the valves in gas/vapor and light liquid service.

(3) After 5 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0, a Permittee may begin to skip 3 of the quarterly leak detection periods for the valves in gas/vapor and light liquid service.

(4) If the percent of valves leaking is greater than 2.0, the Permittee shall comply with the requirements as described in 40 CFR 60.482-7 but can again elect to use 40 CFR 60.483-2.

(5) The percent of valves leaking shall be determined by dividing the sum of valves found leaking during current monitoring and valves for which repair has been delayed by the total number of valves subject to the requirements of 40 CFR 60.483-2.

(6) A Permittee must keep a record of the percent of valves found leaking during each leak detection period.

[Does GE use language in 60.484?]

Compliance Determination Requirements

GG.13 Test Methods and Procedures [326 IAC 12][40 CFR 60.485, Subpart VV]

(a) Pursuant to 40 CFR 60.485(a), in conducting the performance tests required in 40 CFR 60.8, the Permittee shall use as reference methods and procedures the test methods in 40 CFR Part 60, Appendix A or other methods and procedures as specified in 40 CFR 60.485, except as provided in 40 CFR 60.8(b).

(b) Pursuant to 40 CFR 60.485(b), the Permittee shall determine compliance with the standards in 40 CFR 60.482, and 60.483 as follows:

(1) Method 21 shall be used to determine the presence of leaking sources. The instrument shall be calibrated before use each day of its use by the procedures specified in Method 21. The following calibration gases shall be used:

(i) Zero air (less than 10 ppm of hydrocarbon in air); and

(ii) A mixture of methane or n-hexane and air at a concentration of about, but less than, 10,000 ppm methane or n-hexane.

(c) Pursuant to 40 CFR 60.485(c), the Permittee shall determine compliance with the no detectable emission standards in 40 CFR 60.482–2(e), 60.482–3(i), 60.482–4, 60.482–7(f), and 60.482–10(e) as follows:

(1) The requirements of 40 CFR 60.485(b) shall apply.

(2) Method 21 shall be used to determine the background level. All potential leak interfaces shall be traversed as close to the interface as possible. The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 ppm for determining compliance.

(d) Pursuant to 40 CFR 60.485(d), the Permittee shall test each piece of equipment unless he demonstrates that a process unit is not in VOC service, i.e., that the VOC content would never be reasonably expected to exceed 10 percent by weight. For purposes of this demonstration, the following methods and procedures shall be used:

(1) Procedures that conform to the general methods in ASTM E260-73, 91, or 96, E168-67, 77, or 92, E169-63, 77, or 93 (incorporated by reference in 40 CFR 60.17) shall be used to determine the percent VOC content in the process fluid that is contained in or contacts a piece of equipment.

(2) Organic compounds that are considered by the US EPA and IDEM, OAQ to have negligible photochemical reactivity may be excluded from the total quantity of organic compounds in determining the VOC content of the process fluid.

(3) Engineering judgment may be used to estimate the VOC content, if a piece of equipment had not been shown previously to be in service. If the US EPA and IDEM, OAQ disagrees with the judgment, 40 CFR 60.485(d)(1) and 40 CFR 60.485(d)(2) shall be used to resolve the disagreement.

(e) Pursuant to 40 CFR 60.485(e), the Permittee shall demonstrate that an equipment is in light liquid service by showing that all the following conditions apply:

(1) The vapor pressure of one or more of the components is greater than 0.3 kPa at 20 □C (1.2 in. H2O at 68□F). Standard reference texts or ASTM D2879-83, 96, or 97 (incorporated by reference in 40 CFR 60.17) shall be used to determine the vapor pressures.

(2) The total concentration of the pure components having a vapor pressure greater than 0.3 kPa at 20 □C (1.2 in. H2O at 68 □F) is equal to or greater than 20 percent by weight.

(3) The fluid is a liquid at operating conditions.

(f) Pursuant to 40 CFR 60.485(f), samples used in conjunction with 40 CFR 60.485(d), 40 CFR 60.485(e), and 40 CFR 60.485(g) shall be representative of the process fluid that is contained in or contacts the equipment or the gas being combusted in the flare.

(g) [Reserved]

Record Keeping and Reporting Requirement [326 IAC 2-7-5(3)][326 IAC 2-7-19]

GG.14 Standards: Closed Vent Systems and Control Devices [326 IAC 12][40 CFR 60.482-10, Subpart VV]

(a) [Applicable under GG.8]

(b) [Applicable under GG.8]

(c) [Applicable under GG.8]

(d) [Reserved]

(e) [Applicable under GG.8]

(f) [Applicable under GG.8]

(g) [Applicable under GG.8]

(h) [Applicable under GG.8]

(i) [Applicable under GG.8]

(j) [Applicable under GG.8]

(k) [Applicable under GG.8]

(l) Pursuant to 40 CFR 60.482-10(l), the Permittee shall record the information specified below:

(1) Identification of all parts of the closed vent system that are designated as unsafe to inspect, an explanation of why the equipment is unsafe to inspect, and the plan for inspecting the equipment.

(2) Identification of all parts of the closed vent system that are designated as difficult to inspect, an explanation of why the equipment is difficult to inspect, and the plan for inspecting the equipment.

(3) For each inspection during which a leak is detected, a record of the information specified in 40 CFR 60.486(c).

(4) For each inspection conducted in accordance with 40 CFR 60.485(b) during which no leaks are detected, a record that the inspection was performed, the date of the inspection, and a statement that no leaks were detected.

(5) For each visual inspection conducted in accordance with 40 CFR 60.482-10(f)(1)(ii) during which no leaks are detected, a record that the inspection was performed, the date of the inspection, and a statement that no leaks were detected.

(m) [Applicable under GG.8]

GG.15 Recordkeeping Requirements [326 IAC 12][40 CFR 60.486, Subpart VV]

(a) (1) Pursuant to 40 CFR 60.486(a)(1), the Permittee subject to the 40 CFR 60, Subpart VV shall comply with the recordkeeping requirements of this section.

(2) The Permittee of more than one affected facility subject to 40 CFR 60, Subpart VV may comply with the recordkeeping requirements for these facilities in one recordkeeping system if the system identifies each record by each facility.

(b) Pursuant to 40 CFR 60.486(b), when each leak is detected as specified in 40 CFR 60.482-2, 60.482-3, 60.482-7, 60.482-8, and 60.483-2, the following requirements apply:

(1) A weatherproof and readily visible identification, marked with the equipment identification number, shall be attached to the leaking equipment.

(2) The identification on a valve may be removed after it has been monitored for 2 successive months as specified in 40 CFR 60.482-7(c) and no leak has been detected during those 2 months.

(3) The identification on equipment except on a valve, may be removed after it has been repaired.

(c) Pursuant to 40 CFR 60.486(c), when each leak is detected as specified in 40 CFR 60.482-2, 60.482-3, 60.482-7, 60.482-8, and 60.483-2, the following information shall be recorded in a log in a readily accessible location:

(1) The instrument and operator identification numbers and the equipment identification number.

(2) The date the leak was detected and the dates of each attempt to repair the leak.

(3) Repair methods applied in each attempt to repair the leak.

(4) "Above 10,000" if the maximum instrument reading measured by the methods specified in 40 CFR 60.485(a) after each repair attempt is equal to or greater than 10,000 ppm.

(5) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(6) The signature of the employee whose decision it was that repair could not be effected without a process shutdown.

(7) The expected date of successful repair of the leak if a leak is not repaired within 15 days.

(8) Dates of process unit shutdowns that occur while the equipment is unrepaired.

(9) The date of successful repair of the leak.

(d) Pursuant to 40 CFR 60.486(d), the following information pertaining to the design requirements for closed vent systems and control devices described in 40 CFR 60.482-10 shall be recorded and kept in a readily accessible location:

(1) Detailed schematics, design specifications, and piping and instrumentation diagrams.

(2) The dates and descriptions of any changes in the design specifications.

(3) A description of the parameter or parameters monitored, as required in 40 CFR 60.482-10(e), to ensure that control devices are operated and maintained in conformance with their design and an explanation of why that parameter (or parameters) was selected for the monitoring.

(4) Periods when the closed vent systems and control devices required in 40 CFR 60.482–2, 60.482–3, 60.482–4, and 60.482–5 are not operated as designed.

(5) Dates of startups and shutdowns of the closed vent systems and control devices required in 40 CFR 60.482–2, 60.482–3, 60.482–4, and 60.482–5.

(e) Pursuant to 40 CFR 60.486(e), the following information pertaining to all equipment subject to the requirements in 40 CFR 60.482-1 through 40 CFR 60.482-10 and shall be recorded in a log that is kept in a readily accessible location:

(1) A list of identification numbers for equipment subject to the requirements of 40 CFR 60, Subpart VV.

(2) (i) A list of identification numbers for equipment that are designated for no detectable emissions under the provisions of 40 CFR 60.482-2(e), 60.482-3(i) and 60.482-7(f)

(ii) The designation of equipment as subject to the requirements of 40 CFR 60.482–2(e), 60.482–3(i), or 60.482–7(f) shall be signed by the Permittee.

(3) A list of equipment identification numbers for pressure relief devices required to comply with 40 CFR 60.482–4.

(4) (i) The dates of each compliance test as required in 40 CFR 60.482–2(e), 60.482–3(i), 60.482–4, and 60.482–7(f);

(ii) The background level measured during each compliance test;

(iii) The maximum instrument reading measured at the equipment during each compliance test.

(5) A list of identification numbers for equipment in vacuum service.

(f) Pursuant to 40 CFR 60.486(f), the following information pertaining to all valves subject to the requirements of 40 CFR 60.482–7(g) and 60.482–7(h) and to all pumps subject to the requirements of 40 CFR 60.482–2(g) shall be recorded in a log that is kept in a readily accessible location:

(1) A list of identification numbers for valves and pumps that are designated as unsafe-to-monitor, an explanation for each valve or pump stating why the valve or pump is unsafe-to-monitor, and the plan for monitoring each valve or pump.

(2) A list of identification numbers for valves that are designated as difficult-to-monitor, an explanation for each valve stating why the valve is difficult-to-monitor, and the schedule for monitoring each valve.

(g) Pursuant to 40 CFR 60.486(g), the following information shall be recorded for valves complying with 40 CFR 60.483–2:

(1) A schedule of monitoring.

(2) The percent of valves found leaking during each monitoring period.

(h) Pursuant to 40 CFR 60.486(h), the following information shall be recorded in a log that is kept in a readily accessible location:

(1) Design criterion required in 40 CFR 60.482–2(d)(5) and 60.482–3(e)(2) and explanation of the design criterion; and

(2) Any changes to this criterion and the reasons for the changes.

(i) Pursuant to 40 CFR 60.486(i), the following information shall be recorded in a log that is kept in a readily accessible location for use in determining exemptions as provided in 60.480(d):

(1) An analysis demonstrating the design capacity of the affected facility,

(2) A statement listing the feed or raw materials and products from the affected facilities and an analysis demonstrating whether these chemicals are heavy liquids or beverage alcohol, and

(3) An analysis demonstrating that equipment is not in VOC service.

(j) Pursuant to 40 CFR 60.486(j), information and data used to demonstrate that a piece of equipment is not in VOC service shall be recorded in a log that is kept in a readily accessible location.

(k) Pursuant to 40 CFR 60.486(k), the provisions of 40 CFR 60.7(b) and 40 CFR 60.7(d) do not apply to affected facilities subject to 40 CFR 60, Subpart VV.

GG.16 Reporting Requirements [326 IAC 12][40 CFR 60.487, Subpart VV]

(a) Pursuant to 40 CFR 60.487(a), the Permittee shall submit semiannual reports to IDEM, OAQ.

(b) [Reserved]

(c) Pursuant to 40 CFR 60.487(c), all semiannual reports to IDEM, OAQ shall include the following information, summarized from the information required in 40 CFR 60.486.

(1) Process unit identification.

(2) For each month during the semiannual reporting period,

(i) Number of valves for which leaks were detected as described in 40 CFR 60.482(7)(b) or 60.483-2,

(ii) Number of valves for which leaks were not repaired as required in 40 CFR 60.482-7(d)(1),

(iii) Number of pumps for which leaks were detected as described in 40 CFR 60.482-2(b) and 60.482-2(d)(6)(i),

(iv) Number of pumps for which leaks were not repaired as required in 40 CFR 60.482-2(c)(1) and 60.482-2(d)(6)(ii),

(v) Number of compressors for which leaks were detected as described in 40 CFR 60.482-3(f),

(vi) Number of compressors for which leaks were not repaired as required in 40 CFR 60.482-3(g)(1), and

(vii) The facts that explain each delay of repair and, where appropriate, why a process unit shutdown was technically infeasible.

(3) Dates of process unit shutdowns which occurred within the semiannual reporting period.

(4) Revisions to items reported in the initial semiannual report if changes have occurred since the initial report or subsequent revisions to the initial report.

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

SECTION HH 40 CFR 60, Subpart NNN—Standards of Performance for Volatile Organic Compound (VOC) Emissions From Synthetic Organic Chemical Manufacturing Industry (SOCMI) Distillation Operations

Definitions contained in 40 CFR Part 60, Subpart NNN, Section 661 are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2-7-5(1)]

HH.1 Applicability and Designation of Affected Facility [326 IAC 12][40 CFR 60.660, Subpart NNN]

(a) The provisions of 40 CFR 60, Subpart NNN apply to each affected facility designated in 40 CFR 60.660(b) that is part of a process unit that produces any of the chemicals listed in 40 CFR 60.667 as a product, co product, by product, or intermediate, except as provided in 40 CFR 60.660(c).

(b) The affected facility is any of the following for which construction, modification, or reconstruction commenced after December 30, 1983:

(1) [Reserved]

(2) Each combination of a distillation unit and the recovery system into which its vent stream is discharged.

(3) [Reserved]

(c) Exemptions from the provisions of 40 CFR 60.660(a) are as follows:

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) Each affected facility that has a total resource effectiveness (TRE) index value greater than 8.0 is exempt from all provisions of this subpart except for §§60.662; 60.664(e), (f), and (g); and 60.665 (h) and (l).

(5) [Reserved]

(6) Each affected facility operated with a vent stream flow rate less than 0.008 scm/min is exempt from all provisions of this subpart except for the test method and procedure and the recordkeeping and reporting requirements in §60.664(g) and paragraphs (i), (l)(5), and (o) of §60.665.

(d) [Reserved]

HH.2 Standards: [326 IAC 12][40 CFR 60.662, Subpart NNN]

Pursuant to 40 CFR 60.662, the Permittee of any affected facility shall comply with paragraph 40 CFR 60.662(a) or 60.662(c) for each vent stream. The Permittee shall either:

(a) Pursuant to 40 CFR 60.662(a), the Permittee shall reduce emissions of TOC (less methane and ethane) by 98 weight percent, or to a TOC (less methane and ethane) concentration of 20 ppmv, on a dry basis corrected to 3 percent oxygen, whichever is less stringent. If a boiler or process heater is used to comply with 40 CFR 60.662(a), then the vent stream shall be introduced into the flame zone of the boiler or process heater; or

(b) [Reserved]

(c) Pursuant to 40 CFR 60.662(c), the Permittee shall maintain a TRE index value greater than 1.0 without use of VOC emission control devices.

Compliance Determination Requirements

HH.3 Test Methods and Procedures. [326 IAC 12] [40 CFR 60.664, Subpart NNN]

(a) Pursuant to 40 CFR 60.664(a), for the purpose of demonstrating compliance with 40 CFR 60.662, all affected facilities shall be run at full operating conditions and flow rates during any performance test.

(b) Pursuant to 40 CFR 60.664(b), the following methods in Part 60, Appendix A, except as provided under 40 CFR 60.8(b), shall be used as reference methods to determine compliance with the emission limit or percent reduction efficiency specified under 40 CFR 60.662(a).

(1) Method 1 or 1A, as appropriate, for selection of the sampling sites. The control device inlet sampling site for determination of vent stream molar composition or TOC (less methane and ethane) reduction efficiency shall be prior to the inlet of the control device and after the recovery system.

(2) Method 2, 2A, 2C, or 2D, as appropriate, for determination of the gas volumetric flow rates.

(3) The emission rate correction factor, integrated sampling and analysis procedure of Method 3 shall be used to determine the oxygen concentration ($\%O_{2d}$) for the purposes of determining compliance with the 20 ppmv limit. The sampling site shall be the same as that of the TOC samples, and the samples shall be taken during the same time that the TOC samples are taken.

The TOC concentration corrected to 3 percent 0_2 (Cc) shall be computed using the following equation:

$$C_c = C_{TOC} \frac{17.9}{20.9 - \%O_{2d}}$$

where:

Cc = Concentration of TOC corrected to 3 percent O_2, dry basis, ppm by volume.

CTOC = Concentration of TOC (minus methane and ethane), dry basis, ppm by volume.

$\%O_{2d}$ = Concentration of O_2, dry basis, percent by volume.

(4) Method 18 to determine the concentration of TOC in the control device outlet and the concentration of TOC in the inlet when the reduction efficiency of the control device is to be determined.

(i) The sampling time for each run shall be 1 hour in which either an integrated sample or four grab samples shall be taken. If grab sampling is used then the samples shall be taken at 15 minute intervals.

(ii) The emission reduction (R) of TOC (minus methane and ethane) shall be determined using the following equation:

$$R = \frac{E_i - E_o}{E_i} \times 100$$

where:

R = Emission reduction, percent by weight.

Ei = Mass rate of TOC entering the control device, kg/hr (lb/hr).

Eo = Mass rate of TOC discharged to the atmosphere, kg/hr (lb/hr).

(iii) The mass rates of TOC (Ei, Eo) shall be computed using the following equations:

$$E_i = K_2 \left(\sum_{j=1}^{n} C_{ij} M_{ij} \right) Q_i$$

$$E_O = K_2 \left(\sum_{j=1}^{n} C_{oj} M_{oj} \right) Q_O$$

where:

Cij, Coj = Concentration of sample component "j" of the gas stream at the inlet and outlet of the control device, respectively, dry basis, ppm by volume.

Mij, Moj = Molecular weight of sample component "j" of the gas stream at the inlet and outlet of the control device, respectively, g/g-mole (lb/lb-mole).

Qi, Qo = Flow rate of gas stream at the inlet and outlet of the control device, respectively, dscm/min (dscf/min).

K2 = 2.494 × 10-6 (1/ppm)(g-mole/scm) (kg/g) (min/hr) (metric units), where standard temperature for (g-mole/scm) is 20 °C.

= 1.557 × 10-7 (1/ppm) (lb-mole/scf) (min/hr) (English units), where standard temperature for (lb-mole/scf) is 68 °F.

(iv) The TOC concentration (CTOC) is the sum of the individual components and shall be computed for each run using the following equation:

$$C_{TOC} = \sum_{j=1}^{n} C_j$$

where:

CTOC = Concentration of TOC (minus methane and ethane), dry basis, ppm by volume.

Cj = Concentration of sample components "j", dry basis, ppm by volume.

n = Number of components in the sample.

(c) Pursuant to 40 CFR 60.664(c), when a boiler or process heater with a design heat input capacity of 44 MW (150 million Btu/hour) or greater is used to seek to comply with 40 CFR 60.662(a), the requirement for an initial performance test is waived, in accordance with 40 CFR 60.8(b). However, IDEM, OAQ reserves the option to require testing at such other times as may be required, as provided for in section 114 of the Clean Air Act.

(d) [Reserved]

(e) Pursuant to 40 CFR 60.664(e), the following test methods in Part 60, Appendix A, except as provided under 40 CFR 60.8(b), shall be used for determining the net heating value of the gas combusted for determining the process vent stream TRE index value to determine compliance under 40 CFR 60.662(c).

(1) (i) Method 1 or 1A, as appropriate, for selection of the sampling site. The sampling site for the vent stream flow rate and molar composition determination prescribed in 40 CFR 60.664(e)(2) and 60.664(e)(3) shall be, except for the situations outlined in 40 CFR 60.664(e)(1)(ii), prior to the inlet of any control device, prior to any post distillation dilution of the stream with air, and prior to any post distillation introduction of halogenated compounds into the process vent stream. No transverse site selection method is needed for vents smaller than 10 centimeters (4 inches) in diameter.

(ii) If any gas stream other than the distillation vent stream from the affected facility is normally conducted through the final recovery device.

(A) The sampling site for vent stream flow rate and molar composition shall be prior to the final recovery device and prior to the point at which the nondistillation stream is introduced.

(B) The efficiency of the final recovery device is determined by measuring the TOC concentration using Method 18 at the inlet to the final recovery device after the introduction of any nondistillation vent stream and at the outlet of the final recovery device.

(C) This efficiency is applied to the TOC concentration measured prior to the final recovery device and prior to the introduction of the nondistillation stream to determine the concentration of TOC in the distillation vent stream from the final recovery device. This concentration of TOC is then used to perform the calculations outlined in 40 CFR 60.664(e)(4) and 60.664(e)(5)

(2) The molar composition of the process vent stream shall be determined as follows:

(i) Method 18 to measure the concentration of TOC including those containing halogens.

(ii) ASTM D1946–77 or 90 (Reapproved 1994) (incorporation by reference as specified in 40 CFR 60.17) to measure the concentration of carbon monoxide and hydrogen.

(iii) Method 4 to measure the content of water vapor.

(3) The volumetric flow rate shall be determined using Method 2, 2A, 2C, or 2D, as appropriate.

(4) The net heating value of the vent stream shall be calculated using the following equation:

$$H_T = K_1\left(\sum_{j=1}^{n} C_j H_j\right)$$

where:

HT = Net heating value of the sample, MJ/scm (Btu/scf), where the net enthalpy per mole of vent stream is based on combustion at 25 °C and 760 mm Hg (77 °F and 30 in. Hg), but the standard temperature for determining the volume corresponding to one mole is 20 °C (68 °F).

K1 = 1.74 × 10-7 (1/ppm) (g-mole/scm) (MJ/kcal) (metric units), where standard temperature for (g-mole/scm) is 20 °C.

= 1.03 × 10-11 (1/ppm) (lb-mole/scf) (Btu/kcal) (English units) where standard temperature for (lb/mole/scf) is 68 °F.

Cj = Concentration on a wet basis of compound j in ppm, as measured for organics by Method 18 and measured for hydrogen and carbon monoxide by ASTM D1946–77 or 90 (Reapproved 1994) (incorporation by reference as specified in 40 CFR 60.17) as indicated in 40 CFR 60.664(e)(2).

Hj = Net heat of combustion of compound j, kcal/(g-mole) [kcal/(lb-mole)], based on combustion at 25 °C and 760 mm Hg (77 °F and 30 in. Hg).

The heats of combustion of vent stream components would be required to be determined using ASTM D2382–76 (incorporation by reference as specified in 40 CFR 60.17) if published values are not available or cannot be calculated.

(5) The emission rate of TOC in the vent stream shall be calculated using the following equation:

$$E_{TOC} = K_2\left[\sum_{j=1}^{n} C_j M_j\right] Q_s$$

where:

ETOC = Measured emission rate of TOC, kg/hr (lb/hr).

K2 = 2.494×10-6 (1/ppm) (g-mole/scm) (kg/g) (min/hr) (metric units), where standard temperature for (g-mole/scm) is 20 °C.

= 1.557 × 10-7 (1/ppm) (lb-mole/scf) (min/hr) (English units), where standard temperature for (lb-mole/scf) is 68 °F.

Cj = Concentration on a wet basis of compound j in ppm, as measured by Method 18 as indicated in 40 CFR 60.664(e)(2).

Mj = Molecular weight of sample j, g/g-mole (lb/lb-mole).

Qs = Vent stream flow rate, scm/min (scf/min), at a temperature of 20 °C (68 °F).

(6) The total process vent stream concentration (by volume) of compounds containing halogens (ppmv, by compound) shall be summed from the individual concentrations of compounds containing halogens which were measured by Method 18.

(f) Pursuant to 40 CFR 60.664(f), for purposes of complying with 40 CFR 60.662(c) the Permittee of a facility affected by 40 CFR 60, Subpart NNN shall calculate the TRE index value of the vent stream using the equation for incineration in 40 CFR 60.664(f)(1) for halogenated vent streams. The Permittee of an affected facility with a nonhalogenated vent stream shall determine the TRE index value by calculating values using both the incinerator equation in 40 CFR 60.664(f)(1) and the flare equation in 40 CFR 60.664(f)(2) and selecting the lower of the two values.

(1) The equation for calculating the TRE index value of a vent stream controlled by an incinerator is as follows:

$$TRE=\frac{1}{E_{TOC}}\left[a+b\left(Q_s\right)+c\left(Q_s\right)^{0.88}+d\left(Q_s\right)\left(H_T\right)+e\left(Q_s\right)^{0.88}\left(H_T\right)^{0.88}+f\left(Y_s\right)^{0.5}\right]$$

(i) Where for a vent stream flow rate that is greater than or equal to 14.2 scm/min (501 scf/min) at a standard temperature of 20 °C (68 °F):

TRE = TRE index value.

Qs = Vent stream flow rate, scm/min (scf/min), at a temperature of 20 °C (68 °F).

HT = Vent stream net heating value, MJ/scm (Btu/scf), where the net enthalpy per mole of vent stream is based on combustion at 25 °C and 760 mm Hg (68 °F and 30 in. Hg), but the standard temperature for determining the volume corresponding to one mole is 20 °C (68 °F) as in the definition of Qs.

Ys = Qs for all vent stream categories listed in Table 1 in 40 CFR 60.664 except for Category E vent streams where

Ys = QsHT/3.6.

ETOC = Hourly emissions of TOC, kg/hr (lb/hr).

a, b, c, d, e, and f are coefficients.

The set of coefficients that apply to a vent stream can be obtained from Table 1.

TABLE 1. DISTILLATION NSPS TRE COEFFICIENTS FOR VENT STREAMS

CONTROLLED BY AN INCINERATOR

DESIGN CATEGORY A1. FOR HALOGENATED PROCESS VENT STREAMS, IF $0 \leq$ NET HEATING VALUE (MJ/scm) ≤ 3.5 OR IF $0 \leq$ NET HEATING VALUE (Btu/scf) ≤ 94:

Q_s = Vent Stream Flow rate scm/min (scf/min)	a	b	c	d	e	f
$14.2 \leq Q_s \leq 18.8$	18.84466	0.26742	-0.20044	0	0	0.01025
$(501 \leq Q_s \leq 664)$	(41.54494)	(0.016696)	(-0.019194)	(0)	(0)	(0.003803)
$18.8 < Q_s \leq 699$	19.66658	0.26742	-0.25332	0	0	0.01025
$(664 < Q_s \leq 24,700)$	(43.35694)	(0.016696)	(-0.024258)	(0)	(0)	(0.003803)
$699 < Q_s \leq 1400$	39.19213	0.29062	-0.25332	0	0	0.01449
$(24,700 < Q_s \leq 49,000)$	(86.40297)	(0.018145)	(-0.024258)	(0)	(0)	(0.005376)
$1400 < Q_s \leq 2100$	58.71768	0.30511	-0.25332	0	0	0.01775
$(49,000 < Q_s \leq 74,000)$	(129.4490)	(0.019050)	(-0.024258)	(0)	(0)	(0.006585)
$2100 < Q_s \leq 2800$	78.24323	0.31582	-0.25332	0	0	0.02049
$(74,000 < Q_s \leq 99,000)$	(172.4950)	(0.019718)	(-0.024258)	(0)	(0)	(0.007602)
$2800 < Q_s \leq 3500$	97.76879	0.32439	-0.25332	0	0	0.02291
$(99,000 < Q_s \leq 120,000)$	(215.5411)	(0.020253)	(-0.024258)	(0)	(0)	(0.008500)

DESIGN CATEGORY A2. FOR HALOGENATED PROCESS VENT STREAMS, IF NET HEATING VALUE < 3.5 (MJ/scm) OR IF NET HEATING VALUE < 94 (Btu/scf):

Q_s = Vent Stream Flow rate scm/min(scf/min)	a	b	c	d	e	f
$14.2 \leq Q_s \leq 18.8$	18.84466	0.26742	-0.20044	0	0	0.01025
$(501 \leq Q_s \leq 664)$	(41.54494)	(0.016696)	(-0.019194)	(0)	(0)	(0.003803)
$18.8 < Q_s \leq 699$	19.66658	0.26742	-0.25332	0	0	0.01025
$(664 < Q_s \leq 24,700)$	(43.35694)	(0.016696)	(-0.024258)	(0)	(0)	(0.003803)
$699 < Q_s \leq 1400$	39.19213	0.29062	-0.25332	0	0	0.01449
$(24,700 < Q_s \leq 49,000)$	(86.40297)	(0.018145)	(-0.024258)	(0)	(0)	(0.005376)
$1400 < Q_s \leq 2100$	58.71768	0.30511	-0.25332	0	0	0.01775
$(49,000 < Q_s \leq 74,000)$	(129.4490)	(0.019050)	(-0.024258)	(0)	(0)	(0.006585)
$2100 < Q_s \leq 2800$	78.24323	0.31582	-0.25332	0	0	0.02049
$(74,000 < Q_s \leq 99,000)$	(172.4950)	(0.019718)	(-0.024258)	(0)	(0)	(0.007602)
$2800 < Q_s \leq 3500$	97.76879	0.32439	-0.25332	0	0	0.02291
$(99,000 < Q_s \leq 120,000)$	(215.5411)	(0.020253)	(-0.024258)	(0)	(0)	(0.008500)

DESIGN CATEGORY B. FOR NONHALOGENATED PROCESS VENT STREAMS, IF $0 \leq$ NET HEATING VALUE (MJ/scm) ≤ 0.48 OR IF $0 \leq$ NET HEATING VALUE (Btu/scf) ≤ 13:

Q_s = Vent Stream Flow rate scm/min(scf/min)	a	b	c	d	e	f
$14.2 \leq Q_s \leq 1340$	8.54245	0.10555	0.09030	-0.17109	0	0.01025
$(501 \leq Q_s \leq 47,300)$	(18.83268)	(0.0065901)	(0.008647)	(-0.00039762)	(0)	(0.003803)
$1340 < Q_s \leq 2690$	16.94386	0.11470	0.09030	-0.17109	0	0.01449
$(47,300 < Q_s \leq 95,000)$	(37.35443)	(0.0071614)	(0.008647)	(-0.00039762)	(0)	(0.005376)
$2690 < Q_s \leq 4040$	25.34528	0.12042	0.09030	-0.17109	0	0.01775
$(95,000 < Q_s \leq 143,000)$	(55.87620)	(0.0075185)	(0.008647)	(-0.00039762)	(0)	(0.006585)

DESIGN CATEGORY C. FOR NONHALOGENTED PROCESS VENT STREAMS, IF 0.48 < NET HEATING VALUE (MJ/scm) ≤ 1.9 OR IF 13 < NET HEATING VALUE (Btu/scf) ≤ 51:

Q_S = Vent Stream Flow rate scm/min(scf/min)	a	b	c	d	e	f
$14.2 \le Q_S \le 1340$	9.25233	0.06105	0.31937	-0.16181	0	0.01025
$(501 \le Q_S \le 47,300)$	(20.39769)	(0.003812)	(0.030582)	(-0.00037605)	(0)	(0.003803)
$1340 < Q_S \le 2690$	18.36363	0.06635	0.31937	-0.16181	0	0.01449
$(47,300 < Q_S \le 95,000)$	(40.48446)	(0.004143)	(0.030582)	(-0.00037605)	(0)	(0.005376)
$2690 < Q_S \le 4040$	27.47492	0.06965	0.31937	-0.16181	0	0.01775
$(95,000 < Q_S \le 143,000)$	(60.57121)	(0.004349)	(0.030582)	(-0.00037605)	(0)	(0.006585)

DESIGN CATEGORY D. FOR NONHALOGENATED PROCESS VENT STREAMS, IF 1.9 < NET HEATING VALUE (MJ/scm) ≤ 3.6 OR IF 51 < NET HEATING VALUE (Btu/scf) ≤ 97:

Q_S = Vent Stream Flow rate scm/min(scf/min)	a	b	c	d	e	f
$14.2 \le Q_S \le 1180$	6.67868	0.06943	0.02582	0	0	0.01025
$(501 \le Q_S \le 41,700)$	(14.72382)	(0.004335)	(0.002472)	(0)	(0)	(0.003803)
$1180 < Q_S \le 2370$	13.21633	0.07546	0.02582	0	0	0.01449
$(41,700 < Q_S \le 83,700)$	(29.13672)	(0.004711)	(0.002472)	(0)	(0)	(0.005376)
$2370 < Q_S \le 3550$	19.75398	0.07922	0.02582	0	0	0.01775
$(83,700 < Q_S \le 125,000)$	(43.54962)	(0.004946)	(0.002472)	(0)	(0)	(0.006585)

DESIGN CATEGORY E. FOR NONHALOGENATED PROCESS VENT STREAMS, IF NET HEATING VALUE > 3.6 MJ/scm OR IF NET HEATING VALUE > 97 (Btu/scf):

Q_S = Vent Stream Flow rate scm/min(scf/min)	a	b	c	d	e	f
$14.2 \le Y_S \le 1180$	6.67868	0	0	-0.00707	0.02220	0.01025
$(501 \le Y_S \le 41,700)$	(14.72382)	(0)	(0)	(-0.0000164)	(0.0001174)	(0.003803)
$1180 < Y_S \le 2370$	13.21633	0	0	-0.00707	0.02412	0.01449
$(41,700 < Y_S \le 83,700)$	(29.13672)	(0)	(0)	(-0.0000164)	(0.0001276)	(0.005376)
$2370 < Y_S \le 3550$	19.75398	0	0	-0.00707	0.02533	0.01775
$(83,700 < Y_S \le 125,000)$	(43.54962)	(0)	(0)	(-0.0000164)	(0.0001340)	(0.006585)

(ii) Where for a vent stream flow rate that is less than 14.2 scm/min (501 scf/min) at a standard temperature of 20 °C (68 °F):

TRE = TRE index value.

Qs = 14.2 scm/min (501 scf/min).

HT = (FLOW) (HVAL)/Qs.

Where the following inputs are used:

FLOW = Vent stream flow rate, scm/min (scf/min), at a temperature of 20 °C (68 °F).

HVAL = Vent stream net heating value, MJ/scm (Btu/scf), where the net enthalpy per mole of vent stream is based on combustion at 25 °C and 760 mm Hg (68 °F and 30 in. Hg), but the standard temperature for determining the volume corresponding to one mole is 20 °C (68 °F) as in the definition of Qs.

Ys = Qs for all vent stream categories listed in Table 1 in 40 CFR 60.664 except for Category E vent streams where Ys =QsHT/3.6.

ETOC = Hourly emissions of TOC, kg/hr (lb/hr).

a, b, c, d, e, and f are coefficients

The set of coefficients that apply to a vent stream can be obtained from Table 1 in 40 CFR 60.664.

(2) The equation for calculating the TRE index value of a vent stream controlled by a flare is as follows:

$$TRE = \frac{1}{E_{TOC}}\left[a\left(Q_s\right)+b\left(Q_s\right)^{0.8}+c\left(Q_s\right)\left(H_T\right)+d\left(E_{TOC}\right)+e\right]$$

where:

TRE = TRE index value.

ETOC = Hourly emissions of TOC, kg/hr (lb/hr).

Qs = Vent stream flow rate, scm/min (scf/min), at a standard temperature of 20 °C (68 °F).

HT = Vent stream net heating value, MJ/scm (Btu/scf), where the net enthalpy per mole of vent stream is based on combustion at 25 °C and 760 mm Hg (68 °F and 30 in. Hg), but the standard temperature for determining the volume corresponding to one mole is 20 °C (68 °F) as in the definition of Qs.

a, b, c, d, and e are coefficients.

The set of coefficients that apply to a vent stream shall be obtained from Table 2 in 40 CFR 60.664.

Table 2. Distillation NSPS TRE Coefficients for Vent Streams Controlled By a Flare

	a	b	c	d	e
HT< 11.2 MJ/scm	2.25	0.288	-0.193	-0.0051	2.08
(HT < 301 Btu/scf)	(0.140)	(0.0367)	(-0.000448)	(-0.0051)	(4.59)
HT ≥ 11.2 MJ/scm	0.309	0.0619	-0.0043	-0.0034	2.08
(HT ≥ 301 Btu/scf)	(0.0193)	(0.00788)	(-0.0000010)	(-0.0034)	(4.59)

(g) Pursuant to 40 CFR 60.664(g), the Permittee of an affected facility seeking to comply with 40 CFR 60.660(c)(4) or 60.662(c) shall recalculate the TRE index value for that affected facility whenever process changes are made. Examples of process changes include changes in production capacity, feedstock type, or catalyst type, or whenever

there is replacement, removal, or addition of recovery equipment. The TRE index value shall be recalculated based on test data, or on best engineering estimates of the effects of the change to the recovery system.

(1) Where the recalculated TRE index value is less than or equal to 1.0, the Permittee shall notify IDEM, OAQ within 1 week of the recalculation and shall conduct a performance test according to the methods and procedures required by 40 CFR 60.664 in order to determine compliance with 40 CFR 60.662(a). Performance tests must be conducted as soon as possible after the process change but no later than 180 days from the time of the process change.

(2) Where the initial TRE index value is greater than 8.0 and the recalculated TRE index value is less than or equal to 8.0 but greater than 1.0, the Permittee shall conduct a performance test in accordance with 40 CFR 60.8 and 60.664 and shall comply with 40 CFR 60.663, 60.664 and 60.665. Performance tests must be conducted as soon as possible after the process change but no later than 180 days from the time of the process change.

(h) Pursuant to 40 CFR 60.664(h), the Permittee subject to the provisions of 40 CFR 60, Subpart NNN seeking to demonstrate compliance with 40 CFR 60.660(c)(6) shall use Method 2, 2A, 2C, or 2D as appropriate, for determination of volumetric flow rate.

Recordkeeping and Reporting Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-19]

HH.4 Recordkeeping and Reporting Requirements [326 IAC 12] [40 CFR 60.665, Subpart NNN]

(a) Pursuant to 40 CFR 60.665(a), the Permittee subject to 40 CFR 60.662 shall notify IDEM, OAQ of the specific provisions of 40 CFR 60.662 (60.662(a) or 60.662(c)) with which the Permittee has elected to comply. If the Permittee elects at a later date to use an alternative provision of 40 CFR 60.662 with which he or she will comply, then IDEM, OAQ shall be notified by the Permittee 90 days before implementing a change and, upon implementing the change, a performance test shall be performed as specified by 40 CFR 60.664 within 180 days.

(b) Pursuant to 40 CFR 60.665(b), the Permittee subject to the provisions of 40 CFR Part 60, Subpart NNN shall keep an up to date, readily accessible record of the following data measured during each performance test. The same data specified in 40 CFR 60.665 shall be submitted in the reports of all subsequently required performance tests where the TRE index value of a vent stream from a recovery system is determined.

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) Where the Permittee subject to the provisions of 40 CFR Part 60, Subpart NNN seeks to demonstrate compliance with 40 CFR 60.662(c):

(i) [Reserved]

(ii) [Reserved]

(iii) [Reserved]

(iv) [Reserved]

(v) All measurements and calculations performed to determine the TRE index value of the vent stream.

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) Pursuant to 40 CFR 60.665(h), the Permittee of an affected facility subject to the provisions of 40 CFR 60, Subpart NNN and seeking to demonstrate compliance with 40 CFR 60.662(c) shall keep up to date, readily accessible records of:

(1) Any changes in production capacity, feedstock type, or catalyst type, or of any replacement, removal or addition of recovery equipment or a distillation unit;

(2) Any recalculation of the TRE index value performed pursuant to 40 CFR 60.664(f); and

(3) [Reserved]

(i) Pursuant to 40 CFR 60.665(i), the Permittee of an affected facility that seeks to comply with the requirements of 40 CFR Part 60, Subpart NNN by complying with the flow rate cutoff in 40 CFR 60.660(c)(6) shall keep up to date, readily accessible records to indicate that the vent stream flow rate is less than 0.008 scm/min (0.3 scf/min) and of any change in equipment or process operation that increases the operating vent stream flow rate, including a measurement of the new vent stream flow rate.

(j) [Reserved]

(k) [Reserved]

(l) Pursuant to 40 CFR 60.665(l), the Permittee that seeks to comply with the requirements of 40 CFR 60, Subpart NNN by complying with the requirements of 40 CFR 60.660(c)(4), 60.660(c)(6) or 60.662 shall submit to IDEM, OAQ semiannual reports of the following recorded information.

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) Any change in equipment or process operation that increases the operating vent stream flow rate above the low flow exemption level in 40 CFR 60.660(c)(6), including a measurement of the new vent stream flow rate, as recorded under 40 CFR 60.665(i). These must be reported as soon as possible after the change and no later than 180 days after the change. These reports may be submitted either in conjunction with semiannual reports or as a single separate report. A performance test must be completed with the same time period to verify the recalculated flow value and to obtain the vent stream characteristics of heating value and ETOC. The performance test is subject to the requirements of 40 CFR 60.8 of the General Provisions. Unless the facility qualifies for an exemption

under the low capacity exemption status in 40 CFR 60.660(c)(5), the facility must begin compliance with the requirements set forth in 40 CFR 60.662.

(6) [Reserved]

(7) Any recalculation of the TRE index value, as recorded under 40 CFR 60.665(h).

(m) [Reserved]

(n) [Reserved]

(o) [Reserved]

(p) [Reserved]

SECTION II 40 CFR 60, Subpart Db—Standards of Performance for Industrial Commercial Institutional Steam Generating Units

Definitions contained in 40 CFR Part 60, Subpart Db, Section 41b are applicable to the Permittee.

Emission Limitations and Standards [326 IAC 2-7-5(1)]

II.1 Standard for nitrogen oxides.[326 IAC 12] [40 CFR 60.44b]

(a) Pursuant to 40 CFR 60.44b(a), the Permittee that combusts only natural gas and/or distillate oil shall not cause to be discharged into the atmosphere from that affected facility any gases that contain nitrogen oxides (expressed as NO_2) in excess of 0.10 lb/million Btu for any affected facility with a low heat release and 0.20 lb/million Btu for any affected facility with a high heat release.

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) Pursuant to 40 CFR 60.44b(h), for purposes of 40 CFR 60.44b(i), the nitrogen oxide standards in 40 CFR 60.44b apply at all times including periods of startup, shutdown, or malfunction.

(i) Pursuant to 40 CFR 60.44b(i), compliance with the emission limits under 40 CFR 60.44b are determined on a 30 day rolling average basis.

(j) [Reserved]

(k) [Reserved]

(l) [Reserved]

II.2 Emission monitoring for particulate matter and nitrogen oxides [326 IAC 12] [40 CFR 60.48b]

(a) [Reserved]

(b) Pursuant to 40 CFR 60.48b(b), except as provided under 40 CFR 60.48b(g) the Permittee shall comply with either 40 CFR 60.48b(b)(1) or 60.48b(b)(2).

(1) Install, calibrate, maintain, and operate a continuous monitoring system, and record the output of the system, for measuring nitrogen oxides emissions discharged to the atmosphere; or

(2) [Reserved]

(c) Pursuant to 40 CFR 60.48b(c), the continuous monitoring systems required under 40 CFR 60.48b(b) shall be operated and data recorded during all periods of operation of the affected facility except for continuous monitoring system breakdowns and repairs. Data is recorded during calibration checks, and zero and span adjustments.

(d) Pursuant to 40 CFR 60.48b(d), the 1 hour average nitrogen oxides emission rates measured by the continuous nitrogen oxides monitor required by 40 CFR 60.48b(b) and

required under 40 CFR 60.13(h) shall be expressed in ng/J or lb/million Btu heat input and shall be used to calculate the average emission rates under 40 CFR 60.44b. The 1 hour averages shall be calculated using the data points required under 40 CFR 60.13(b). At least 2 data points must be used to calculate each 1 hour average.

(e) Pursuant to 40 CFR 60.48b(e), the procedures under 40 CFR 60.13 shall be followed for installation, evaluation, and operation of the continuous monitoring systems.

(1) [Reserved]

(2) For affected facilities combusting natural gas, the span value for nitrogen oxides is 500 PPM.

(3) [Reserved]

(f) Pursuant to 40 CFR 60.48b(f), when nitrogen oxides emission data are not obtained because of continuous monitoring system breakdowns, repairs, calibration checks and zero and span adjustments, emission data will be obtained by using standby monitoring systems, Method 7, Method 7A, or other approved reference methods to provide emission data for a minimum of 75 percent of the operating hours in each steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days.

(g) Pursuant to 40 CFR 60.48b(g), the Permittee of an affected facility that has a heat input capacity of 73 MW (250 million Btu/hour) or less, and which has an annual capacity factor for residual oil having a nitrogen content of 0.30 weight percent or less, natural gas, distillate oil, or any mixture of these fuels, greater than 10 percent (0.10) shall:

(1) Comply with the provisions of 40 CFR 60.48b(b), 60.48b(c), 60.48b(d), 60.48b(e)(2) and 60.48b(f), or

(2) [Reserved]

(h) [Reserved]

(i) [Reserved]

Compliance Determination Requirements

II.3 Compliance and performance test methods and procedures for particulate matter and nitrogen oxides.[326 IAC 12] [40 CFR 60.46b]

(a) [Reserved]

(b) [Reserved]

(c) Pursuant to 40 CFR 60.46b(c), compliance with the nitrogen oxides emission standards under 40 CFR 60.44b shall be determined through performance testing under 40 CFR 60.46b(e).

(d) [Reserved]

(e) Pursuant to 40 CFR 60.46b(e), to determine compliance with the emission limits for nitrogen oxides required under 40 CFR 60.44b, the Permittee of an affected facility shall conduct the performance test as required under 40 CFR 60.8 using the continuous system for monitoring nitrogen oxides under 40 CFR 60.48(b).

(1) [Reserved]

(2) [Reserved]

(3) [Reserved]

(4) Following the date on which the initial performance test is completed or required to be completed under 40 CFR 60.8, whichever date comes first, the Permittee of an affected facility which has a heat input capacity of 73 MW (250 million Btu/hour) or less and which combusts natural gas, having a nitrogen content of 0.30 weight percent or less shall upon request determine compliance with the nitrogen oxides standards under 40 CFR 60.44b through the use of a 30 day performance test. During periods when performance tests are not requested, nitrogen oxides emissions data collected pursuant to 40 CFR 60.48b(g)(1) or 40 CFR 60.48b(g)(2) are used to calculate a 30 day rolling average emission rate on a daily basis and used to prepare excess emission reports, but will not be used to determine compliance with the nitrogen oxides emission standards. A new 30 day rolling average emission rate is calculated each steam generating unit operating day as the average of all of the hourly nitrogen oxides emission data for the preceding 30 steam generating unit operating days.

(5) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

Record Keeping and Reporting Requirement [326 IAC 2-7-5(3)][326 IAC 2-7-19]

II.4 Reporting and recordkeeping requirements [326 IAC 12] [40 CFR 60.49b]

(a) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) Pursuant to 40 CFR 60.49b(d), the Permittee of an affected facility shall record and maintain records of the amount of natural gas combusted during each day and calculate the annual capacity factor for natural gas for the reporting period. The annual capacity factor is determined on a 12 month rolling average basis with a new annual capacity factor calculated at the end of each calendar month.

(e) [Reserved]

(f) [Reserved]

(g) Pursuant to 40 CFR 60.49b(g), the Permittee of an affected facility subject to the nitrogen oxides standards under 40 CFR 60.44b shall maintain records of the following information for each steam generating unit operating day:

(1) Calendar date.

(2) The average hourly nitrogen oxides emission rates (expressed as NO_2) (ng/J or lb/million Btu heat input) measured or predicted.

(3) The 30 day average nitrogen oxides emission rates (ng/J or lb/million Btu heat input) calculated at the end of each steam generating unit operating day from the

measured or predicted hourly nitrogen oxide emission rates for the preceding 30 steam generating unit operating days.

(4) Identification of the steam generating unit operating days when the calculated 30 day average nitrogen oxides emission rates are in excess of the nitrogen oxides emissions standards under 40 CFR 60.44b, with the reasons for such excess emissions as well as a description of corrective actions taken.

(5) Identification of the steam generating unit operating days for which pollutant data have not been obtained, including reasons for not obtaining sufficient data and a description of corrective actions taken.

(6) Identification of the times when emission data have been excluded from the calculation of average emission rates and the reasons for excluding data.

(7) Identification of “F” factor used for calculations, method of determination, and type of fuel combusted.

(8) Identification of the times when the pollutant concentration exceeded full span of the continuous monitoring system.

(9) Description of any modifications to the continuous monitoring system that could affect the ability of the continuous monitoring system to comply with Performance Specification 2 or 3.

(10) Results of daily CEMS drift tests and quarterly accuracy assessments as required under appendix F, Procedure 1.

(h) Pursuant to 40 CFR 60.49b(h), the Permittee of any affected facility in any category listed in 60.49b(h)(2) is required to submit excess emission reports for any excess emissions which occurred during the reporting period.

(1) [Reserved]

(2) Any affected facility that is subject to the nitrogen oxides standard of 40 CFR 60.44b, and that

(i) Combusts natural gas, distillate oil, or residual oil with a nitrogen content of 0.3 weight percent or less, or

(ii) Has a heat input capacity of 73 MW (250 million Btu/hour) or less and is required to monitor nitrogen oxides emissions on a continuous basis under 40 CFR 60.48b(g)(1).

(3) [Reserved]

(4) For purposes of 40 CFR 60.48b(g)(1), excess emissions are defined as any calculated 30 day rolling average nitrogen oxides emission rate, as determined under 40 CFR 60.46b(e), which exceeds the applicable emission limits in 40 CFR 60.44b.

(i) Pursuant to 40 CFR 60.49b(i), the Permittee shall submit reports containing the information recorded under 40 CFR 60.49b(g).

(j) [Reserved]

(k) [Reserved]

(l) [Reserved]

(m) [Reserved]

(n) [Reserved]

(o) [Reserved]

(p) [Reserved]

(q) [Reserved]

(r) [Reserved]

(s) [Reserved]

(t) [Reserved]

(u) [Reserved]

(v) Pursuant to 40 CFR 60.49b(v), the Permittee of an affected facility may submit electronic quarterly reports for SO_2 and/or NOx and/or opacity in lieu of submitting the written reports required under 40 CFR 60.49b(h), or 60.49b(i). The format of each quarterly electronic report shall be coordinated with the permitting authority. The electronic report(s) shall be submitted no later than 30 days after the end of the calendar quarter and shall be accompanied by a certification statement from the Permittee, indicating whether compliance with the applicable emission standards and minimum data requirements of 40 CFR Part 60, Subpart Db was achieved during the reporting period. Before submitting reports in the electronic format, the Permittee shall coordinate with IDEM, OAQ to obtain their agreement to submit reports in this alternative format.

(w) Pursuant to 40 CFR 60.49b(w), the reporting period for the reports required under 40 CFR Part 60, Subpart Db is each 6 month period. All reports shall be submitted to IDEM, OAQ and shall be postmarked by the 30th day following the end of the reporting period.

SECTION JJ 40 CFR 63, Subpart TT --National Emission Standards for Equipment Leaks -- Control Level 1

Definitions contained in 40 CFR Part 63, Subpart TT, Section 1001 are applicable to the Permittee.

Emission Limitations and Standards

JJ.1 Compliance assessment. [326 IAC 14][40 CFR 63.1002, Subpart JJ]

(a) Pursuant to 40 CFR 63.1002(a), compliance assessment; General procedures for compliance assessment. Compliance with 40 CFR Part 63, Subpart TT will be determined by review of the records required by 40 CFR 63.1017 and the reports required by 40 CFR 63.1018, by review of performance test results, and by inspections.

(b) Pursuant to 40 CFR 63.1002(b), alternative means of emission limitation. The provisions of 40 CFR 63.1002(b) do not apply to the performance standards of 40 CFR 63.1006(e)(4) for valves designated as having no detectable emissions, 40 CFR 63.1011(b) for pressure relief devices, or 40 CFR 63.1012(f) for compressors operating under the alternative compressor standard.

(1) The Permittee may request a determination of alternative means of emission limitation to the requirements of 40 CFR 63.1005 through 63.1015 as provided in 40 CFR 63.1002(b)(2) through 63.1002(b)(6). If IDEM, OAQ makes a determination that an alternative means of emission limitation is a permissible alternative, the Permittee shall comply with the alternative.

(2) Permission to use an alternative means of emission limitation shall be governed by the following procedures in 40 CFR 63.1002(b)(3) through 63.1002(b)(6) of 63.1002.

(3) Where the standard is an equipment, design, or operational requirement the criteria specified in 40 CFR 63.1002(b)(3)(i) and 63.1002(b)(3)(ii) shall be met.

(i) The Permittee applying for permission to use an alternative means of emission limitation shall be responsible for collecting and verifying emission performance test data for an alternative means of emission limitation.

(ii) IDEM, OAQ will compare test data for the means of emission limitation to test data for the equipment, design, and operational requirements.

(4) Where the standard is a work practice the criteria specified in 40 CFR 63.1002(b)(4)(i) through 63.1002(b)(4)(iv) shall be met.

(i) The Permittee applying for permission shall be responsible for collecting and verifying test data for an alternative means of emission limitation.

(ii) For each kind of equipment for which permission is requested, the emission reduction achieved by the alternative means of emission limitation shall be demonstrated.

(iii) IDEM, OAQ will compare the demonstrated emission reduction for the alternative means of emission limitation to the demonstrated emission reduction for the required work practices.

(iv) IDEM, OAQ may condition the permission on requirements that may be necessary to ensure operation and maintenance to achieve the same or greater emission reduction as the required work practices of 40 CFR Part 63, Subpart TT.

(5) The Permittee may offer a unique approach to demonstrate the alternative means of emission limitation.

(6) If, in the judgement of US EPA and IDEM, OAQ an alternative means of emission limitation will be approved, US EPA will publish a notice of the determination in the Federal Register.

(7) (i) Manufacturers of equipment used to control equipment leaks of a regulated material may apply to IDEM, OAQ for permission for an alternative means of emission limitation that achieves a reduction in emissions of the regulated material achieved by the equipment, design, and operational requirements of 40 CFR Part 63, Subpart TT.

(ii) IDEM OAQ will grant permission according to the provisions of 40 CFR 63.1002(b)(3), 63.1002(b)(4), 63.1002(b)(5) and 63.1002(b)(6).

JJ.2 Equipment identification. [326 IAC 14][40 CFR 63.1003, Subpart JJ]

(a) Pursuant to 40 CFR 63.1003(a); General equipment identification. Equipment subject to 40 CFR Part 63, Subpart TT shall be identified. Identification of the equipment does not require physical tagging of the equipment. For example, the equipment may be identified on a plant site plan, in log entries, by designation of process unit or affected facility boundaries by some form of weatherproof identification, or by other appropriate methods.

(b) Pursuant to 40 CFR 63.1003(b); Additional equipment identification. In addition to the general identification required by 40 CFR 63.1003(a), equipment subject to any of the provisions in 40 CFR 63.1006 to 63.1015 shall be specifically identified as required in 40 CFR 63.1003(b)(1) through 63.1003(b)(5), as applicable.

(1) Connectors. Except for inaccessible, ceramic, or ceramic-lined connectors meeting the provisions of 40 CFR 63.1008(d)(2) and instrumentation systems identified pursuant to 40 CFR 63.1008(b)(4), identify the connectors subject to the requirements of 40 CFR Part 63, Subpart TT. Connectors need not be individually identified if all connectors in a designated area or length of pipe subject to the provisions of 40 CFR Part 63, Subpart TT are identified as a group, and the number of connectors subject is indicated.

(2) Routed to a process or fuel gas system or equipped with a closed vent system and control device. Identify the equipment that the Permittee elects to route to a process or fuel gas system or equip with a closed vent system and control device, under the provisions of 40 CFR 63.1007(e)(3) (pumps in light liquid service), 40 CFR 63.1009(e)(3) (agitators in gas and vapor service and in light liquid service), 40 CFR 63.1011(d) (pressure relief devices in gas and vapor service), 63.1012(e) (compressors), or 63.1016 (alternative means of emission limitation for enclosed vented process units).

(3) Pressure relief devices. Identify the pressure relief devices equipped with rupture disks, under the provisions of 40 CFR 63.1011(e).

(4) Instrumentation systems. Identify instrumentation systems subject to the provisions of 40 CFR 63.1010. Individual components in an instrumentation system need not be identified.

(5) Equipment in service less than 300 hours per calendar year. The identity, either by list, location (area or group), or other method, of equipment in regulated material service less than 300 hours per calendar year within a process unit or affected facilities subject to the provisions of 40 CFR Part 63, Subpart TT shall be recorded.

(c) Pursuant to 40 CFR 63.1003(c); Special equipment designations: Equipment that is unsafe or difficult-to-monitor.

(1) Designation and criteria for unsafe-to-monitor. Valves meeting the provisions of 40 CFR 63.1006(e)(1), pumps meeting the provisions of 40 CFR 63.1007(e)(5), connectors meeting the provisions of 40 CFR 63.1008(d)(1), and agitators meeting the provisions of 40 CFR 63.1009(e)(7) may be designated unsafe-to-monitor if the Permittee determines that monitoring personnel would be exposed to an immediate danger as a consequence of complying with the monitoring requirements of 40 CFR Part 63, Subpart TT. Examples of an unsafe-to-monitor equipment include, but is not limited to, equipment under extreme pressure or heat.

(2) Designation and criteria for difficult-to-monitor. Valves meeting the provisions of 40 CFR 63.1006(e)(2) may be designated difficult-to-monitor if the provisions of 40 CFR 63.1003(c)(2)(i) apply. Agitators meeting the provisions of 40 CFR 63.1009(f)(5) may be designated difficult-to-monitor if the provisions of 40 CFR 63.1003(c)(2)(ii) apply.

(i) Valves.

(A) The Permittee of the valve determines that the equipment cannot be monitored without elevating the monitoring personnel more than 2 meters (7 feet) above a support surface or it is not accessible in a safe manner when it is in regulated material service.

(B) The process unit or affected facility within which the valve is located is an existing source, or the Permittee designates less than 3 percent of the total number of valves in a new source as difficult-to-monitor.

(ii) Agitators. The Permittee determines that the agitator cannot be monitored without elevating the monitoring personnel more than 2 meters (7 feet) above a support surface or it is not accessible in a safe manner when it is in regulated material service.

(3) [Reserved]

(4) Identification of unsafe or difficult-to-monitor equipment. The Permittee shall record the identity of equipment designated as unsafe-to-monitor according to the provisions of 40 CFR 63.1003(c)(1) and the planned schedule for monitoring this equipment. The Permittee shall record the identity of equipment designated as difficult-to-monitor according to the provisions of 40 CFR 63.1003(c)(2), the planned schedule for monitoring this equipment, and an explanation why the equipment is difficult-to-monitor. This record must be kept at the plant and be available for review by an inspector.

(5) Written plan requirements.

(i) The Permittee of equipment designated as unsafe-to-monitor except connectors meeting the provisions of 40 CFR 63.1008(d)(1) according to the provisions of 40 CFR 63.1003(c)(1) shall have a written plan that requires monitoring of the equipment as frequently as practical during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable, and repair of the equipment according to the procedures in 40 CFR 63.1005 if a leak is detected.

(ii) The Permittee of equipment designated as difficult-to-monitor according to the provisions of 40 CFR 63.1003(c)(2) shall have a written plan that requires monitoring of the equipment at least once per calendar year, and repair of the equipment according to the procedures in 40 CFR 63.1005 if a leak is detected.

(d) Pursuant to 40 CFR 63.1003(d); Special equipment designations: Unsafe-to-repair.

(1) Designation and criteria. Connectors subject to the provisions of 40 CFR 63.1005(e) may be considered unsafe-to-repair if the Permittee determines that repair personnel would be exposed to an immediate danger as a consequence of complying with the repair requirements of 40 CFR Part 63, Subpart TT, and if the connector will be repaired before the end of the next process unit or affected facility shutdown as specified in 40 CFR 63.1005(e).

(2) Identification of equipment. The identity of connectors designated as unsafe-to-repair and an explanation why the connector is unsafe-to-repair shall be recorded.

(e) Pursuant to 40 CFR 63.1003(e); Special equipment designations: Equipment operating with no detectable emissions.

(1) Designation and criteria. Equipment may be designated as having no detectable emissions if it has no external actuating mechanism in contact with the process fluid and is operated with emissions less than 500 parts per million above background as determined by the method specified in 40 CFR 63.1004(b) and 63.1004(c).

(2) Identification of equipment. The identity of equipment designated as no detectable emissions shall be recorded.

(3) Identification of compressors operating under no detectable emissions. Identify the compressors that the Permittee elects to designate as operating with an instrument reading of less than 500 parts per million above background, under the provisions of 40 CFR 63.1012(f).

JJ.3 Equipment identification. [326 IAC 14][40 CFR 63.1004, Subpart JJ]

(a) Pursuant to 40 CFR 63.1004(a); Instrument and sensory monitoring for leaks. Monitoring for leaks. The Permittee of a regulated source subject to 40 CFR Part 62, Subpart TT shall monitor all regulated equipment as specified in 40 CFR 63.1004(a)(1) for instrument monitoring and 40 CFR 63.1004(a)(2) for sensory monitoring.

(1) Instrument monitoring for leaks.

(i) Valves in gas and vapor service and in light liquid service shall be monitored pursuant to 40 CFR 63.1006(b).

(ii) Pumps in light liquid service shall be monitored pursuant to 40 CFR 63.1007(b).

(iii) Connectors in gas and vapor service and in light liquid service shall be monitored pursuant to 40 CFR 63.1008(b).

(iv) Agitators in gas and vapor service and in light liquid service shall be monitored pursuant to 40 CFR 63.1009(b).

(v) Pressure relief devices in gas and vapor service shall be monitored pursuant to 40 CFR 63.1011(c).

(vi) Compressors designated to operate with an instrument reading less than 500 parts per million as described in 40 CFR 63.1003(e), shall be monitored pursuant to 40 CFR 63.1012(f).

(2) Sensory monitoring for leaks.

(i) Pumps in light liquid service shall be observed pursuant to 40 CFR 63.1007(b)(3) and 63.1007(e)(1)(v).

(ii) [Reserved]

(iii) Agitators in gas and vapor service and in light liquid service shall be observed pursuant to 40 CFR 63.1009(b)(3) or 63.1009(e)(1)(iv).

(iv) [Reserved]

(b) Pursuant to 40 CFR 63.1004(b); Instrument monitoring methods. Instrument monitoring, as required under 40 CFR Part 63, Subpart TT, shall comply with the requirements specified in 40 CFR 63.1004(b)(1) through 63.1004(b)(6).

(1) Monitoring method. Monitoring shall comply with Method 21 of 40 CFR Part 60, Appendix A.

(2) Detection instrument performance criteria.

(i) Except as provided for in 40 CFR 63.1004(b)(2)(ii), the detection instrument shall meet the performance criteria of Method 21 of 40 CFR Part 60, Appendix A, except the instrument response factor criteria in Section 3.1.2(a) of Method 21 shall be for the representative composition of the process fluid, and not for each individual HAP, VOC or other regulated material individual chemical compound in the stream. For process streams that contain nitrogen, air, water, or other inerts that are not regulated materials, the representative stream response factor shall be calculated on an inert-free basis. The response factor may be determined at any concentration for which monitoring for leaks will be conducted.

(ii) If there is no instrument commercially available that will meet the performance criteria specified in 40 CFR 63.1004(b)(2)(i), the instrument readings may be adjusted by multiplying by the representative response factor of the process fluid, calculated on an inert-free basis as described in 40 CFR 63.1004(b)(2)(i).

(3) Detection instrument calibration procedure. The detection instrument shall be calibrated before use on each day of its use by the procedures specified in Method 21 of 40 CFR Part 60, Appendix A.

(4) Detection instrument calibration gas. Calibration gases shall be zero air (less than 10 parts per million of hydrocarbon in air); and a mixture of methane in air at a concentration of approximately, but less than, 10,000 parts per million; or a mixture of n-hexane in air at a concentration of approximately, but less than, 10,000 parts per million. A calibration gas other than methane in air or n-hexane in air may be used if the instrument does not respond to methane or n-hexane or if the instrument does not meet the performance criteria specified in 40 CFR

63.1004(b)(2)(i). In such cases, the calibration gas may be a mixture of one or more compounds to be measured in air.

(5) Monitoring performance. Monitoring shall be performed when the equipment is in regulated material service or is in use with any other detectable material.

(6) Monitoring data. Monitoring data obtained prior to the regulated source becoming subject to the referencing subpart that do not meet the criteria specified in 40 CFR 63.1004(b)(1) through 63.1004(b)(5) may still be used to initially qualify for less frequent monitoring under the provisions in 40 CFR 63.1006(a)(2), 63.1006(b)(3) or 63.1006(b)(4) for valves provided the departures from the criteria specified or from the specified monitoring frequency of 40 CFR 63.1006(b)(3) are minor and do not significantly affect the quality of the data. Examples of minor departures are monitoring at a slightly different frequency (such as every six weeks instead of monthly or quarterly), following the performance criteria of Section 3.1.2(a) of Method 21 of Appendix A of 40 CFR Part 60 instead of 40 CFR 63.1006(b)(2), or monitoring at a different leak definition if the data would indicate the presence or absence of a leak at the concentration specified in the referencing subpart. Failure to use a calibrated instrument is not considered a minor departure.

(c) Pursuant to 40 CFR 63.1004(c); Instrument monitoring using background adjustments. The Permittee may elect to adjust or not to adjust the instrument readings for background. If the Permittee elects not to adjust instrument readings for background, the Permittee shall monitor the equipment according to the procedures specified in 40 CFR 63.1004(b)(1) through 63.1004(b)(5). In such case, all instrument readings shall be compared directly to the applicable leak definition for the monitored equipment to determine whether there is a leak or to determine compliance with 40 CFR 63.1011(b) (pressure relief devices in gas and vapor service) or 40 CFR 63.1012(f) (compressors). If the Permittee elects to adjust instrument readings for background, the Permittee shall monitor the equipment according to the procedures specified in 40 CFR 63.1004(c)(1) through 63.1004(c)(4).

(1) The requirements of 40 CFR 63.1004(b)(1) through 63.1004(b)(5) shall apply.

(2) The background level shall be determined, using the procedures in Method 21 of 40 CFR Part 60, Appendix A.

(3) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible (as described in Method 21 of 40 CFR Part 60, Appendix A).

(4) The arithmetic difference between the maximum concentration indicated by the instrument and the background level shall be compared to the applicable leak definitions for the monitored equipment to determine whether there is a leak or to determine compliance with 40 CFR 63.1011(b) (pressure relief devices in gas and vapor service) or 40 CFR 63.1012(f) (compressors).

(d) Pursuant to 40 CFR 63.1004(d); Sensory monitoring methods. Sensory monitoring, as required under 40 CFR Part 63, Subpart TT, shall consist of detection of a potential leak to the atmosphere by visual, audible, olfactory, or any other detection method.

(e) Pursuant to 40 CFR 63.1004(e); Leaking equipment identification and records.

(1) When each leak is detected pursuant to the monitoring specified in 40 CFR 63.1004(a), a weatherproof and readily visible identification, marked with the equipment identification, shall be attached to the leaking equipment.

(2) When each leak is detected, the information specified in 40 CFR 63.1005(e) shall be recorded and kept pursuant to the referencing subpart.

JJ.4 Leak repair. [326 IAC 14][40 CFR 63.1005, Subpart JJ]

(a) Pursuant to 40 CFR 63.1005(a); Leak repair schedule. The Permittee shall repair each leak detected no later than 15 calendar days after it is detected, except as provided in 40 CFR 63.1005(c) and 63.1005(d). A first attempt at repair shall be made no later than 5 calendar days after the leak is detected. First attempt at repair for pumps includes, but is not limited to, tightening the packing gland nuts and/or ensuring that the seal flush is operating at design pressure and temperature. First attempt at repair for valves includes, but is not limited to, tightening the bonnet bolts, and/or replacing the bonnet bolts, and/or tightening the packing gland nuts, and/or injecting lubricant into the lubricated packing.

(b) Pursuant to 40 CFR 63.1005(b); Leak identification removal.

(1) Valves in gas/vapor and light liquid service. The leak identification on a valve in gas/vapor or light liquid service may be removed after it has been monitored as specified in 40 CFR 63.1006(b), and no leak has been detected during that monitoring. The leak identification on a connector in gas/vapor or light liquid service may be removed after it has been monitored as specified in 40 CFR 63.1008(b) and no leak has been detected during that monitoring.

(2) Other equipment. The identification that has been placed, pursuant to 40 CFR 63.1004(e), on equipment determined to have a leak, except for a valve in gas/vapor or light liquid service, may be removed after it is repaired.

(c) Pursuant to 40 CFR 63.1005(c); Delay of repair. Delay of repair can be used as specified in any of 40 CFR 63.1005(c)(1) through 63.1005(c)(5). The Permittee shall maintain a record of the facts that explain any delay of repairs and, where appropriate, why the repair was technically infeasible without a process unit shutdown.

(1) Delay of repair of equipment for which leaks have been detected is allowed if the repair is technically infeasible without a process unit or affected facility shutdown within 15 days after a leak is detected. Repair of this equipment shall occur as soon as practical, but not later than by the end of the next process unit or affected facility shutdown, except as provided in 40 CFR 63.1005(c)(5).

(2) Delay of repair of equipment for which leaks have been detected is allowed for equipment that is isolated from the process and that does not remain in regulated material service.

(3) Delay of repair for valves, connectors, and agitators is also allowed if the criteria specified in 40 CFR 63.1005(c)(3)(i) and 63.1005(c)(3)(ii) are met.

(i) The Permittee determines that emissions of purged material resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair, and

(ii) When repair procedures are effected, the purged material is collected and destroyed, or recovered in a control or recovery device, or routed to a fuel gas system or process complying with 40 CFR 63.1015 or 63.1002(b).

(4) Delay of repair for pumps is allowed if the criteria specified in 40 CFR 63.1005(c)(4)(i) and 63.1005(c)(4)(ii) are met.

(i) Repair requires replacing the existing seal design with a new system that the Permittee has determined will provide better performance or one of

the specifications of 40 CFR 63.1005(c)(4)(i)(A) through 63.1005(c)(4)(i)(C) are met.

(A) A dual mechanical seal system that meets the requirements of 40 CFR 63.1007(e)(1) will be installed,

(B) A pump that meets the requirements of 40 CFR 63.1007(e)(2) will be installed; or

(C) A system that routes emissions to a process or a fuel gas system or a closed vent system and control device that meets the requirements of 40 CFR 63.1007(e)(3) will be installed.

(ii) Repair is to be completed as soon as practical, but not later than 6 months after the leak was detected.

(5) Delay of repair beyond a process unit or affected facility shutdown will be allowed for a valve if valve assembly replacement is necessary during the process unit or affected facility shutdown, and valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the second process unit or affected facility shutdown will not be allowed unless the third process unit or affected facility shutdown occurs sooner than 6 months after the first process unit or affected facility shutdown.

(d) Pursuant to 40 CFR 63.1005(d); Unsafe-to-repair connectors. Any connector that is designated, as described in 40 CFR 63.1003(d), as an unsafe-to-repair connector is exempt from the requirements of 40 CFR63.1008(c), and 63.1005(a).

(e) Pursuant to 40 CFR 63.1005(e); Leak repair records. For each leak detected, the information specified in 40 CFR 63.1005(e)(1) through 63.1005(e)(5) shall be recorded and maintained pursuant to the referencing subpart.

(1) The date of first attempt to repair the leak.

(2) The date of successful repair of the leak.

(3) Maximum instrument reading measured by Method 21 of 40 CFR Part 60, Appendix A at the time the leak is successfully repaired or determined to be nonrepairable.

(4) “Repair delayed” and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak as specified in 40 CFR 63.1005(e)(4)(i) and 63.1005(e)(4)(ii).

(i) The Permittee may develop a written procedure that identifies the conditions that justify a delay of repair. The written procedures may be included as part of the startup, shutdown, and malfunction plan, as required by the referencing subpart for the source, or may be part of a separate document that is maintained at the plant site. In such cases, reasons for delay of repair may be documented by citing the relevant sections of the written procedure.

(ii) If delay of repair was caused by depletion of stocked parts, there must be documentation that the spare parts were sufficiently stocked on site before depletion and the reason for depletion.

(5) Dates of process unit or affected facility shutdowns that occur while the equipment is unrepaired.

JJ.5 Valves in gas and vapor service and in light liquid service standards. [326 IAC 14][40 CFR 63.1006, Subpart JJ]

(a) Pursuant to 40 CFR 63.1006(a); Compliance schedule.

(1) The Permittee shall comply with 40 CFR 63.1006 no later than the compliance dates specified in the referencing subpart.

(2) The use of monitoring data generated before the regulated source became subject to the referencing subpart to initially qualify for less frequent monitoring is governed by the provisions of 40 CFR 63.1004(b)(6).

(b) Pursuant to 40 CFR 63.1006(b); Leak detection. Unless otherwise specified in 40 CFR 63.1002(b), or 63.1016, or in 63.1006(e), or the referencing subpart, the Permittee shall monitor all valves at the intervals specified in 40 CFR 63.1006(b)(3) through 63.1006(b)(6) and shall comply with all other provisions of 63.1006.

(1) Monitoring method. The valves shall be monitored to detect leaks by the method specified in 40 CFR 63.1004(b) and 63.1004(c).

(2) Instrument reading that defines a leak. The instrument reading that defines a leak is 10,000 parts per million or greater.

(3) Monitoring period.

(i) Each valve shall be monitored monthly to detect leaks, except as provided in 40 CFR 63.1006(b)(3)(ii), 63.1006(e)(1), 63.1006(e)(2), and 63.1006(e)(4). The Permittee may otherwise elect to comply with one of the alternative standards in 40 CFR 63.1006(b)(5) or 63.1006(b)(6) as specified in 40 CFR 63.1006(b)(4).

(ii) (A) Any valve for which a leak is not detected for 2 successive months may be monitored the same month (first, second, or third month) of every quarter, beginning with the next quarter, until a leak is detected. The first quarterly monitoring shall occur less than 3 months following the last monthly monitoring.

(B) If a leak is detected, the valve shall be monitored monthly until a leak is not detected for 2 successive months.

(C) For purposes of 40 CFR 63.1006(b), quarter means a 3-month period with the first quarter concluding on the last day of the last full month during the 180 days following initial startup.

(4) Allowance of alternative standards. The Permittee may elect to comply with one of the alternatives specified in either 40 CFR 63.1006(b)(5) or 63.1006(b)(6) if the percentage of valves leaking is equal to or less than 2.0 percent as determined by the procedure in 40 CFR 63.1006(c). The Permittee must notify IDEM, OAQ before implementing one of the alternatives specified in either 40 CFR 63.1006(b)(5) or 63.1006(b)(6).

(5) Allowable percentage alternative. The Permittee choosing to comply with the allowable percentage alternative shall have an allowable percentage of leakers no greater than 2.0 percent for each affected facility or process unit and shall comply with 40 CFR 63.1006(b)(5)(i) and 63.1006(b)(5)(ii).

(i) A compliance demonstration for each affected facility or process unit or affected facility complying with 40 CFR 63.1006(b)(5) shall be conducted initially upon designation, annually, and at other times requested by IDEM, OAQ. For each such demonstration, all valves in gas and vapor and light liquid service within the affected facility or process unit shall be monitored within 1 week by the methods specified in 40 CFR 63.1004(b). If an instrument reading exceeds the equipment leak level specified in the referencing subpart, a leak is detected. The leak percentage shall be calculated as specified in 40 CFR 63.1006(c).

(ii) If the Permittee decides no longer to comply with 40 CFR 63.1006(b)(5), the Permittee must notify IDEM, OAQ in writing that the work practice standard described in 40 CFR 63.1006(b)(3) will be followed.

(6) Skip period alternatives. The Permittee may elect to comply with one of the alternative work practices specified in 40 CFR 63.1006(b)(6)(i) or 63.1006(b)(6)(ii). The Permittee electing to use one of these skip period alternatives shall comply with 40 CFR 63.1006(b)(6)(iii) and 63.1006(b)(6)(iv). Before using either skip period alternative, the Permittee shall initially comply with the requirements of 40 CFR 63.1006(b)(3). Monitoring data generated before the regulated source became subject to the referencing subpart that meets the criteria of either 40 CFR 63.1004(b)(1) through 63.1004(b)(5), or 63.1004(b)(6), may be used to initially qualify for skip period alternatives.

(i) After 2 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0 as determined by the procedure in 40 CFR 63.1006(c), the Permittee may begin to monitor for leaks once every 6 months.

(ii) After 5 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0 as determined by the procedure in 40 CFR 63.1006(c), the Permittee may begin to monitor for leaks once every year.

(iii) If the percent of valves leaking is greater than 2.0, the Permittee shall comply with 40 CFR 63.1006(b)(3), but can elect to comply with 63.1006(b)(6) if future percent of valves leaking is again equal to or less than 2.0.

(iv) The Permittee shall keep a record of the monitoring schedule and the percent of valves found leaking during each monitoring period.

(c) Pursuant to 40 CFR 63.1006(c); Percent leaking valves calculation—calculation basis and procedures.

(1) The Permittee shall decide no later than the compliance date of 40 CFR Part 63, Subpart TT, or upon revision of an operating permit whether to calculate percent leaking valves on a process unit or group of process units basis. Once the Permittee has decided, all subsequent percentage calculations shall be made on the same basis and this shall be the basis used for comparison with the subgrouping criteria specified in 40 CFR 63.1006(b)(5)(i).

(2) The percent of valves leaking shall be determined by dividing the sum of valves found leaking during current monitoring and valves for which repair has been delayed by the total number of valves subject to the requirements of 40 CFR 63.1006.

(d) Pursuant to 40 CFR 63.1006(d); Leak repair.

(1) If a leak is determined pursuant to 40 CFR 63.1006(b), 63.1006(e)(1), or 63.1006(e)(2), then the leak shall be repaired using the procedures in 40 CFR 63.1005, as applicable.

(2) After a leak determined pursuant to 40 CFR 63.1006(b) or 63.1006(e)(2) has been repaired, the valve shall be monitored at least once within the first 3 months after its repair. The monitoring required by 40 CFR 63.1006(b)(2) is in addition to the monitoring required to satisfy the definition of repair.

(i) The monitoring shall be conducted as specified in 40 CFR 63.1004(b) and 63.1004(c), as appropriate, to determine whether the valve has resumed leaking.

(ii) Periodic monitoring required by 40 CFR 63.1006(b) may be used to satisfy the requirements of 40 CFR 63.1006(d)(2)(ii), if the timing of the monitoring period coincides with the time specified in 40 CFR 63.1006(d)(2)(ii). Alternatively, other monitoring may be performed to satisfy the requirements of 40 CFR 63.1006(d)(2)(ii), regardless of whether the timing of the monitoring period for periodic monitoring coincides with the time specified in 40 CFR 63.1006(d)(2)(ii).

(iii) If a leak is detected by monitoring that is conducted pursuant to 40 CFR 63.1006(d)(2), the Permittee shall follow the provisions of 40 CFR 63.1006(d)(2)(iii)(A) and 63.1006(d)(2)(iii)(B), to determine whether that valve must be counted as a leaking valve for purposes of 40 CFR 63.1006(c).

(A) If the Permittee elected to use periodic monitoring required by 40 CFR 63.1006(b) to satisfy the requirements of 40 CFR 63.1006(d)(2), then the valve shall be counted as a leaking valve.

(B) If the Permittee elected to use other monitoring, prior to the periodic monitoring required by 40 CFR 63.1006(b), to satisfy the requirements of 40 CFR 63.1006(d)(2), then the valve shall be counted as a leaking valve unless it is repaired and shown by periodic monitoring not to be leaking.

(e) Pursuant to 40 CFR 63.1006(e); Special provisions for valves.

(1) Unsafe-to-monitor valves. Any valve that is designated, as described in 40 CFR 63.1003(c)(1), as an unsafe-to-monitor valve, is exempt from the monitoring requirements of 40 CFR 63.1006(b), and the Permittee shall monitor the valve according to the written plan specified in 40 CFR 63.1003(c)(5).

(2) Difficult-to-monitor. Any valve that is designated, as described in 40 CFR 63.1003(c)(2), as a difficult-to-monitor valve, is exempt from the requirements of 40 CFR 63.1006(b), and the Permittee shall monitor the valve according to the written plan specified in 40 CFR 63.1003(c)(5).

(3) Less than 250 valves. Any equipment located at a plant site with fewer than 250 valves in regulated material service is exempt from the monthly monitoring specified in 40 CFR 63.1006(b)(3)(i). Instead, the Permittee shall monitor each valve in regulated material service for leaks once each quarter, or comply with 40 CFR 63.1006(b)(3)(ii)(A), 63.1006(b)(3)(ii)(B), or 63.1006(b)(3)(ii)(C) except as provided in 40 CFR 63.1006(e)(1) and 63.1006(e)(2).

(4) No detectable emissions.

(i) Any valve that is designated, as described in 40 CFR 63.1003(e), as having no detectable emissions is exempt from the requirements of 40 CFR 63.1006(b) through 63.1006(c) if the Permittee meets the criteria specified in 40 CFR 63.1006(e)(4)(i)(A) and 63.1006(e)(4)(i)(B).

(A) Tests the valve for operation with emissions less than 500 parts per million above background as determined by the method specified in 40 CFR 63.1004(c) initially upon designation, annually, and at other times requested by IDEM, OAQ, and

(B) Records the dates of each compliance demonstration, the background level measured during each compliance test, and the maximum instrument reading measured at the equipment during each compliance test.

(ii) A valve may not be designated or operated for no detectable emissions, as described in 40 CFR 63.1003(e), if the valve has an instrument reading greater than 500 parts per million above background.

JJ.6 Pumps in light liquid service standards. [326 IAC 14][40 CFR 63.1007, Subpart JJ]

(a) Pursuant to 40 CFR 63.1007(a); Compliance schedule. The Permittee shall comply with 63.1007 no later than the compliance date specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1007(b); Leak detection. Unless otherwise specified in 40 CFR 63.1002(b), or 63.1016 or 40 CFR 63.1007(e), the Permittee shall monitor each pump monthly to detect leaks and shall comply with all other provisions of 40 CFR 63.1007.

(1) Monitoring method. The pumps shall be monitored to detect leaks by the method specified in 40 CFR 63.1004(b).

(2) Instrument reading that defines a leak. The instrument reading that defines a leak is 10,000 parts per million.

(3) Visual inspection. Each pump shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. The Permittee shall document that the inspection was conducted and the date of the inspection. If there are indications of liquids dripping from the pump seal, a leak is detected. Unless the Permittee demonstrates (e.g., through instrument monitoring) that the indications of liquids dripping are due to a condition other than process fluid drips, the leak shall be repaired according to the procedures of 40 CFR 63.1007(b)(4).

(4) Visual inspection: Leak repair. Where a leak is identified by visual indications of liquids dripping, repair shall mean that the visual indications of liquids dripping have been eliminated.

(c) Pursuant to 40 CFR 63.1007(c); Percent leaking pumps calculation.

(1) The Permittee shall decide no later than the compliance date of 40 CFR Part 63 or upon revision of an operating permit whether to calculate percent leaking pumps on a process unit basis or group of process units basis. Once the Permittee has decided, all subsequent percentage calculations shall be made on the same basis.

(2) The number of pumps at a process unit shall be the sum of all the pumps in regulated material service, except that pumps found leaking in a continuous

process unit or within 1 month after startup of the pump shall not count in the percent leaking pumps calculation for that one monitoring period only.

(3) Percent leaking pumps shall be determined by the following equation:

$$\%P_L = \left(\left(P_L - P_S\right)/\left(P_T - P_S\right)\right) \times 100 \qquad [Eq.\ 1]$$

Where:

%PL = Percent leaking pumps

PL = Number of pumps found leaking as determined through monthly monitoring as required in 40 CFR 63.1007(b). Do not include results from inspection of unsafe-to-monitor pumps pursuant to 40 CFR 63.1007(e)(6)

PT = Total pumps in regulated material service, including those meeting the criteria in 40 CFR 63.1007(e)(1), 63.1007(e)(2), 63.1007(e)(3), and 63.1007(e)(6).

PS = Number of pumps leaking within 1 month of start-up during the current monitoring period.

(d) Pursuant to 40 CFR 63.1007(d); Leak repair. If a leak is detected pursuant to 40 CFR 63.1007(b), then the leak shall be repaired using the procedures in 40 CFR 63.1005, as applicable, unless otherwise specified in 40 CFR 63.1007(b)(4) for leaks identified by visual indications of liquids dripping.

(e) Pursuant to 40 CFR 63.1007(e); Special provisions for pumps.

(1) Dual mechanical seal pumps. Each pump equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of 40 CFR 63.1007(b), provided the requirements specified in 40 CFR 63.1007(e)(1)(i) through 63.1007(e)(1)(viii) are met.

(i) The Permittee determines, based on design considerations and operating experience, criteria applicable to the presence and frequency of drips and to the sensor that indicates failure of the seal system, the barrier fluid system, or both. The Permittee shall keep records at the plant of the design criteria and an explanation of the design criteria, and any changes to these criteria and the reasons for the changes. This record must be available for review by an inspector.

(ii) Each dual mechanical seal system shall meet the requirements specified in 40 CFR 63.1007(e)(1)(ii)(A) through 63.1007(e)(1)(ii)(C).

(A) Each dual mechanical seal system is operated with the barrier fluid at a pressure that is at all times (except periods of startup, shutdown, or malfunction) greater than the pump stuffing box pressure; or

(B) Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR Part 63, Subpart SS; or

(C) Equipped with a closed-loop system that purges the barrier fluid into a process stream.

(iii) The barrier fluid is not in light liquid service.

(iv) Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(v) Each pump is checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. The Permittee shall document that the inspection was conducted and the date of the inspection. If there are indications of liquids dripping from the pump seal at the time of the weekly inspection, the Permittee shall follow the procedure specified in either 40 CFR 63.1007(e)(1)(v)(A) or 63.1007(e)(1)(v)(B) prior to the next required inspection.

(A) The Permittee shall monitor the pump as specified in 40 CFR 63.1004(b) to determine if there is a leak of regulated material in the barrier fluid; if an instrument reading of 10,000 parts per million or greater is measured, a leak is detected and shall be repaired using the procedures in 40 CFR 63.1005; or

(B) The Permittee shall eliminate the visual indications of liquids dripping.

(vi) If indications of liquids dripping from the pump seal exceed the criteria established in 40 CFR 63.1007(e)(1)(i), or if based on the criteria established in 40 CFR 63.1007(e)(1)(i) of the sensor indicates failure of the seal system, the barrier fluid system, or both, a leak is detected.

(vii) Each sensor as described in 40 CFR 63.1007(e)(1)(iv) is observed daily or is equipped with an alarm unless the pump is located within the boundary of an unmanned plant site.

(viii) When a leak is detected pursuant to 40 CFR 63.1007(e)(1)(vi), it shall be repaired as specified in 40 CFR 63.1005.

(2) No external shaft. Any pump that is designed with no externally actuated shaft penetrating the pump housing is exempt from the requirements of 40 CFR 63.1007(b).

(3) Routed to a process or fuel gas system or equipped with a closed vent system. Any pump that is routed to a process or a fuel gas system or equipped with a closed vent system that captures and transports leakage from the pump to a control device meeting the requirements of 40 CFR 63.1015 is exempt from requirements of 40 CFR 63.1007(b).

(4) Unmanned plant site. Any pump that is located within the boundary of an unmanned plant site is exempt from the weekly visual inspection requirement of 40 CFR 63.1007(b)(3), and 63.1007(e)(1)(v), and the daily requirements of 40 CFR 63.1007(e)(1)(vii), provided that each pump is visually inspected as often as practical and at least monthly.

(5) Unsafe-to-monitor pumps. Any pump that is designated, as described in 40 CFR 63.1003(c)(1), as an unsafe-to-monitor pump is exempt from the requirements of 40 CFR 63.1007(b) and the requirements of 40 CFR 63.1005 and the Permittee shall monitor the pump according to the written plan specified in 40 CFR 63.1003(c)(5).

JJ.7 Connectors in gas and vapor service and in light liquid service standards. [326 IAC 14][40 CFR 63.1008, Subpart JJ]

(a) Pursuant to 40 CFR 63.1008(a); Compliance schedule. The Permittee shall comply with 40 CFR 63.1008 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1008(b); Leak detection. Unless otherwise specified in 40 CFR 63.1002(b), or 63.1016, or the referencing subpart, the Permittee shall monitor all connectors within 5 days by the method specified in 40 CFR 63.1004(b) if evidence of a potential leak is found by visual, audible, olfactory, or any other detection method. No monitoring is required if the evidence of a potential leak is eliminated within 5 days. If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected.

(c) Pursuant to 40 CFR 63.1008(c); Leak repair. If a leak is detected pursuant to 40 CFR 63.1008(b), then the leak shall be repaired using the procedures in 40 CFR 63.1005, as applicable.

(d) Pursuant to 40 CFR 63.1008(d); Special provisions for connectors.

(1) Unsafe-to-monitor connectors. Any connector that is designated, as described in 40 CFR 63.1003(c)(1), as an unsafe-to-monitor connector is exempt from the requirements of 40 CFR 63.1008(b) and the Permittee shall monitor according to the written plan specified in 40 CFR 63.1003(c)(5).

(2) Inaccessible, ceramic, or ceramic-lined connectors.

(i) Any connector that is inaccessible or that is ceramic or ceramic-lined (e.g., porcelain, glass, or glass-lined), is exempt from the monitoring requirements of 40 CFR 63.1008(b), the leak repair requirements of 40 CFR 63.1008(c), and the recordkeeping and reporting requirements of 40 CFR 63.1017 and 63.1018. An inaccessible connector is a connector that meets any of the provisions specified in 40 CFR 63.1008(d)(2)(i)(A) through 63.1008(d)(2)(i)(F), as applicable.

(A) Buried;

(B) Insulated in a manner that prevents access to the connector by a monitor probe;

(C) Obstructed by equipment or piping that prevents access to the connector by a monitor probe; or

(D) Unable to be reached from a wheeled scissor-lift or hydraulic-type scaffold that would allow access to connectors up to 7.6 meters (25 feet) above the ground.

(E) Inaccessible because it would require elevating the monitoring personnel more than 2 meters (7 feet) above a permanent support surface or would require the erection of scaffold;

(F) Not able to be accessed at any time in a safe manner to perform monitoring. Unsafe access includes, but is not limited to, the use of a wheeled scissor-lift on unstable or uneven terrain, the use of a motorized man-lift basket in areas where an ignition potential exists, or access would require near proximity to hazards such as electrical lines, or would risk damage to equipment.

(ii) If any inaccessible ceramic or ceramic-lined connector is noted to have a leak by visual, audible, olfactory, or other means, the leak to the atmosphere shall be eliminated as soon as practical.

JJ.8 Agitators in gas and vapor service and in light liquid service standards. [326 IAC 14][40 CFR 63.1009, Subpart JJ]

(a) Pursuant to 40 CFR 63.1009(a); Compliance schedule. The Permittee shall comply with 40 CFR 63.1009 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1009(b); Leak detection.

(1) Monitoring method. Each agitator seal shall be monitored monthly to detect leaks by the methods specified in 40 CFR 63.1004(b), or 63.1016, except as provided in 63.1002(b) or 63.1009(e).

(2) Instrument reading that defines a leak. If an instrument reading equivalent of 10,000 parts per million or greater is measured, a leak is detected.

(3) Visual inspection. Each agitator seal shall be checked by visual inspection each calendar week for indications of liquids dripping from the agitator seal. The Permittee shall document that the inspection was conducted and the date of the inspection. If there are indications of liquids dripping from the agitator seal, the Permittee shall follow the procedures specified in 40 CFR 63.1009(b)(3)(i) and 63.1009(b)(3)(ii) prior to the next required inspection.

(i) The Permittee shall monitor the agitator seal as specified in 40 CFR 63.1004(b) to determine if there is a leak of regulated material. If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected, and it shall be repaired using the procedures in 40 CFR 63.1009(d);

(ii) The Permittee shall eliminate the indications of liquids dripping from the agitator seal.

(c) [Reserved]

(d) Pursuant to 40 CFR 63.1009(d); Leak repair. If a leak is detected, then the leak shall be repaired using the procedures in 40 CFR 63.1005, as applicable.

(e) Pursuant to 40 CFR 63.1009(e); Special provisions for agitators.

(1) Dual mechanical seal. Each agitator equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of 40 CFR 63.1009(b), provided the requirements specified in 40 CFR 63.1009(e)(1)(i) through 63.1009(e)(1)(vi) are met.

(i) Each dual mechanical seal system shall meet the applicable requirement specified in 40 CFR 63.1009(e)(1)(i)(A), 63.1009(e)(1)(i)(B), or 63.1009(e)(1)(i)(C).

(A) Operated with the barrier fluid at a pressure that is at all times (except during periods of startup, shutdown, or malfunction) greater than the agitator stuffing box pressure; or

(B) Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that meets the requirements of 40 CFR 63.1015; or

(C) Equipped with a closed-loop system that purges the barrier fluid into a process stream.

(ii) The barrier fluid is not in light liquid service.

(iii) Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(iv) Each agitator seal is checked by visual inspection each calendar week for indications of liquids dripping from the agitator seal. If there are indications of liquids dripping from the agitator seal at the time of the weekly inspection, the Permittee shall follow the procedure specified in either 40 CFR 63.1009(e)(1)(iv)(A) or 63.1009(e)(1)(iv)(B) prior to the next required inspection.

(A) The Permittee shall monitor the agitator seal shall as specified in 40 CFR 63.1004(b) to determine the presence of regulated material in the barrier fluid. If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected and it shall be repaired using the procedures in 40 CFR 63.1005; or

(B) The Permittee shall eliminate the visual indications of liquids dripping.

(v) Each sensor as described in 40 CFR 63.1009(e)(1)(iii) is observed daily or is equipped with an alarm unless the agitator seal is located within the boundary of an unmanned plant site.

(vi) The Permittee of each dual mechanical seal system shall meet the requirements specified in 40 CFR 63.1009(e)(1)(vi)(A) through 63.1009(e)(1)(vi)(D).

(A) The Permittee shall determine, based on design considerations and operating experience, criteria applicable to the presence and frequency of drips and to the sensor that indicates failure of the seal system, the barrier fluid system, or both.

(B) The Permittee shall keep records of the design criteria and an explanation of the design criteria; and any changes to these criteria and the reasons for the changes.

(C) If indications of liquids dripping from the agitator seal exceed the criteria established in 40 CFR 63.1009(e)(1)(vi)(A) and 63.1009(e)(1)(vi)(B), or if, based on the criteria established in 40 CFR 63.1009(e)(1)(vi)(A) and 63.1009(e)(1)(vi)(B), the sensor indicates failure of the seal system, the barrier fluid system, or both, a leak is detected.

(D) When a leak is detected, it shall be repaired using the procedures in 40 CFR 63.1005.

(2) No external shaft. Any agitator that is designed with no externally actuated shaft penetrating the agitator housing is exempt from the requirements of 40 CFR 63.1009(b).

(3) Routed to a process or fuel gas system or equipped with a closed vent system. Any agitator that is routed to a process or fuel gas system or equipped with a

closed vent system that captures and transports leakage from the agitator to a control device meeting the requirements of 40 CFR 63.1015 is exempt from the monitoring requirements of 63.1009(b).

(4) Unmanned plant site. Any agitator that is located within the boundary of an unmanned plant site is exempt from the weekly visual inspection requirement of 40 CFR 63.1009(b)(3) and 63.1009(e)(1)(iv), and the daily requirements of 40 CFR 63.1009(e)(1)(v), provided that each agitator is visually inspected as often as practical and at least monthly.

(5) Difficult-to-monitor agitator seals. Any agitator seal that is designated, as described in 40 CFR 63.1003(c)(2), as a difficult-to-monitor agitator seal is exempt from the requirements of 40 CFR 63.1009(b) and the Permittee shall monitor the agitator seal according to the written plan specified in 40 CFR 63.1003(c)(5).

(6) Equipment obstructions. Any agitator seal that is obstructed by equipment or piping that prevents access to the agitator by a monitor probe is exempt from the monitoring requirements of 40 CFR 63.1009(b).

(7) Unsafe-to-monitor agitator seals. Any agitator seal that is designated, as described in 40 CFR 63.1003(c)(1), as an unsafe-to-monitor agitator seal is exempt from the requirements of 40 CFR 63.1009(b) and the Permittee of the agitator seal monitors the agitator seal according to the written plan specified in 40 CFR 63.1003(c)(5).

JJ.9 Pumps, valves, connectors, and agitators in heavy liquid service; pressure relief devices in liquid service; and instrumentation systems standards.[326 IAC 14][40 CFR 63.1010, Subpart JJ]

(a) Pursuant to 40 CFR 63.1010(a); Compliance schedule. The Permittee shall comply with 63.1010 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1010(b); Leak detection.

(1) Monitoring method. Unless otherwise specified in 40 CFR 63.1002(b), or 63.1016, the Permittee shall comply with 40 CFR 63.1010(b)(1) and 63.1010(b)(2). Pumps, valves, connectors, and agitators in heavy liquid service; pressure relief devices in light liquid or heavy liquid service; and instrumentation systems shall be monitored within 5 calendar days by the method specified in 40 CFR 63.1004(b) if evidence of a potential leak to the atmosphere is found by visual, audible, olfactory, or any other detection method. If such a potential leak is repaired as required in 40 CFR 63.1010(c), it is not necessary to monitor the system for leaks by the method specified in 40 CFR 63.1004(b).

(2) Instrument reading that defines a leak. For systems monitored by the method specified in 40 CFR 63.1004(b), if an instrument reading of 10,000 parts per million or greater is measured, a leak is detected. If a leak is detected, it shall be identified pursuant to 40 CFR 63.1004(e) and repaired pursuant to 63.1005.

(c) Pursuant to 40 CFR 63.1010(c); Leak repair. If a leak is determined pursuant to 63.1010, then the leak shall be repaired using the procedures in 40 CFR 63.1005, as applicable. For equipment identified in 40 CFR 63.1010(b) that is not monitored by the method specified in 40 CFR 63.1004(b), repaired shall mean that the visual, audible, olfactory, or other indications of a leak to the atmosphere have been eliminated; that no bubbles are observed at potential leak sites during a leak check using soap solution; or that the system will hold a test pressure.

JJ.10 Pressure relief devices in gas and vapor service standards.[326 IAC 14][40 CFR 63.1011, Subpart JJ]

(a) Pursuant to 40 CFR 63.1011(a); Compliance schedule. The Permittee shall comply with 63.1011 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1011(b); Compliance standard. Except during pressure releases as provided for in 40 CFR 63.1011(c), each pressure relief device in gas or vapor service shall be operated with an instrument reading of less than 500 parts per million as measured by the method specified in 40 CFR 63.1004(c).

(c) Pursuant to 40 CFR 63.1011(c); Pressure relief requirements.

(1) After each pressure release, the pressure relief device shall be returned to a condition indicated by an instrument reading of less than 500 parts per million, as soon as practical, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.1011(d).

(2) The pressure relief device shall be monitored no later than five calendar days after the pressure release and being returned to regulated material service to confirm the condition indicated by an instrument reading of less than 500 parts per million, as measured by the method specified in 40 CFR 63.1004(c).

(3) The Permittee shall record the dates and results of the monitoring required by 40 CFR 63.1011(c)(2) following a pressure release including maximum instrument reading measured during the monitoring and the background level measured if the instrument reading is adjusted for background.

(d) Pursuant to 40 CFR 63.1011(d); Pressure relief devices routed to a process or fuel gas system or equipped with a closed vent system and control device. Any pressure relief device that is routed to a process or fuel gas system or equipped with a closed vent system that captures and transports leakage from the pressure relief device to a control device meeting the requirements of 40 CFR 63.1015 is exempt from the requirements of 40 CFR 63.1011(b) and 63.1011(c).

(e) Pursuant to 40 CFR 63.1011(e); Rupture disk exemption. Any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of 40 CFR 63.1011(b) and 63.1011(c) provided the Permittee installs a replacement rupture disk upstream of the pressure relief device as soon as practical after each pressure release, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.1005(d).

JJ.11 Compressor standards.[326 IAC 14][40 CFR 63.1012, Subpart JJ]

(a) Pursuant to 40 CFR 63.1012(a); Compliance schedule. The Permittee shall comply with 63.1012 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1012(b); Seal system standard. Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of process fluid to the atmosphere, except as provided in 40 CFR 63.1002(b) and 63.1012(e) and 63.1012(f). Each compressor seal system shall meet the requirements specified in 40 CFR 63.1012(b)(1), 63.1012(b)(2), or 63.1012(b)(3).

(1) Operated with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure at all times (except during periods of startup, shutdown, or malfunction); or

(2) Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that meets the requirements of 40 CFR 63.1015; or

(3) Equipped with a closed-loop system that purges the barrier fluid directly into a process stream.

(c) Pursuant to 40 CFR 63.1012(c); Barrier fluid system. The barrier fluid shall not be in light liquid service. Each barrier fluid system shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both. Each sensor shall be observed daily or shall be equipped with an alarm unless the compressor is located within the boundary of an unmanned plant site.

(d) Pursuant to 40 CFR 63.1012(d); Failure criterion and leak detection.

(1) The Permittee shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion, a leak is detected and shall be repaired pursuant to 40 CFR 63.1005, as applicable.

(2) The Permittee shall keep records of the design criteria and an explanation of the design criteria; and any changes to these criteria and the reasons for the changes.

(e) Pursuant to 40 CFR 63.1012(e); Routed to a process or fuel gas system or equipped with a closed vent system and control device. A compressor is exempt from the requirements of 40 CFR 63.1012(b) through 63.1012(d) if it is equipped with a system to capture and transport leakage from the compressor drive shaft seal to a process or a fuel gas system or to a closed vent system that captures and transports leakage from the compressor to a control device meeting the requirements of 40 CFR 63.1015.

(f) Pursuant to 40 CFR 63.1012(f); Alternative compressor standard.

(1) Any compressor that is designated as described in 40 CFR 63.1003(e) as operating with no detectable emissions shall operate at all times with an instrument reading of less than 500 parts per million. A compressor so designated is exempt from the requirements of 40 CFR 63.1012(b) through 63.1012(d) if the compressor is demonstrated initially upon designation, annually, and at other times requested by IDEM, OAQ to be operating with an instrument reading of less than 500 parts per million as measured by the method specified in 40 CFR 63.1004(c). A compressor may not be designated or operated having an instrument reading of less than 500 parts per million as described in 40 CFR 63.1003(e) if the compressor has a maximum instrument reading greater than 500 parts per million.

(2) The Permittee shall record the dates and results of each compliance test including the background level measured and the maximum instrument reading measured during each compliance test.

(g) Pursuant to 40 CFR 63.1012(g); Reciprocating compressor exemption. Any existing reciprocating compressor in a process unit or affected facility that becomes an affected facility under provisions of 40 CFR 60.14 or 60.15 is exempt from 40 CFR 63.1012(b), 63.1012(c), and 63.1012(d) provided the Permittee demonstrates that recasting the distance piece or replacing the compressor are the only options available to bring the compressor into compliance with the provisions of the above exempted of 40 CFR 63.1012.

JJ.12 Sampling connection systems standards.[326 IAC 14][40 CFR 63.1013, Subpart JJ]

(a) Pursuant to 40 CFR 63.1013(a); Compliance schedule. The Permittee shall comply with 63.1013 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1013(b); Equipment requirement. Each sampling connection system shall be equipped with a closed purge, closed loop, or closed vent system, except as provided in 40 CFR 63.1013(d). Gases displaced during filling of the sample container are not required to be collected or captured.

(c) Pursuant to 40 CFR 63.1013(c); Equipment design and operation. Each closed-purge, closed-loop, or closed vent system except as provided in 40 CFR 63.1013(d) shall meet the applicable requirements specified in 40 CFR 63.1013(c)(1) through 63.1013(c)(5).

(1) The system shall return the purged process fluid directly to a process line or fuel gas system meeting the compliance determinations in 40 CFR 63.1015 or 63.1002(b) as appropriate; or

(2) Collect and recycle the purged process fluid to a process; or

(3) Be designed and operated to capture and transport all the purged process fluid to a control device that meets the requirements of 40 CFR 63.1015; or

(4) Collect, store, and transport the purged process fluid to a system or facility identified in 40 CFR 63.1013(c)(4)(i), 63.1013(c)(4)(ii), or 63.1013(c)(4)(iii).

(i) A waste management unit as defined in 40 CFR 63.111 or 40 CFR Part 63, Subpart G, if the waste management unit is complying with the provisions of 40 CFR Part 63, Subpart G, applicable to group 1 wastewater streams. If the purged process fluid does not contain any organic HAP listed in Table 9 of 40 CFR Part 63, Subpart G, the waste management unit need not be subject to, and operated in compliance with the requirements of 40 CFR Part 63, Subpart G, applicable to subject wastewater steams provided the facility has a National Pollution Discharge Elimination System (NPDES) permit or sends the wastewater to an NPDES-permitted facility.

(ii) A treatment, storage, or disposal facility subject to regulation under 40 CFR Part 262, 264, 265, or 266; or

(iii) A facility permitted, licensed, or registered by a State to manage municipal or industrial solid waste, if the process fluids are not hazardous waste as defined in 40 CFR Part 261.

(5) Containers that are part of a closed-purge system must be covered or closed when not being filled or emptied.

(d) Pursuant to 40 CFR 63.1013(d); In-situ sampling systems. In-situ sampling systems and sampling systems without purges are exempt from the requirements of 40 CFR 63.1013(b) and 63.1013(c).

JJ.13 Open-ended valves or lines standards.[326 IAC 14][40 CFR 63.1014, Subpart JJ]

(a) Pursuant to 40 CFR 63.1014(a); Compliance schedule. The Permittee shall comply with 63.1014 no later than the compliance dates specified in the referencing subpart.

(b) Pursuant to 40 CFR 63.1014(b); Equipment and operational requirements.

(1) Each open-ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve, except as provided in 40 CFR 63.1002(b) and 63.1014(c) and 63.1014(d). The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring process fluid flow through the

open-ended valve or line, or during maintenance. The operational provisions of 40 CFR 63.1014(b)(2) and 63.1014(b)(3) also apply.

(2) Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed.

(3) When a double block and bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with 40 CFR 63.1014(b)(1) at all other times.

(c) Pursuant to 40 CFR 63.1014(c); Emergency shutdown exemption. Open-ended valves or lines in an emergency shutdown system that are designed to open automatically in the event of a process upset are exempt from the requirements of 40 CFR 63.1014(b).

(d) Pursuant to 40 CFR 63.1014(d); Polymerizing materials exemption. Open-ended valves or lines containing materials that would autocatalytically polymerize or, would present an explosion, serious over pressure, or other safety hazard if capped or equipped with a double block and bleed system as specified in 40 CFR 63.1014(b) are exempt from the requirements of 63.1014(b).

JJ.14 Closed vent systems and control devices; or emissions routed to a fuel gas system or process. [326 IAC 14][40 CFR 63.1015, Subpart JJ]

(a) Pursuant to 40 CFR 63.1015(a); Compliance schedule. The Permittee shall comply with 63.1015 no later than the compliance dates specified in the referencing subpart.

(b) Compliance standard.

(1) The Permittee who owns or operates closed vent systems and nonflare control devices to comply with provisions of 40 CFR Part 63, Subpart TT shall design and operate the closed vent system and nonflare control devices to reduce emissions of regulated material with an efficiency of 95 percent or greater or to reduce emissions of regulated material to a concentration of 20 parts per million by volume or, for an enclosed combustion device, to provide a minimum of 760□C (1400□F). The Permittee who owns or operates closed vent systems and nonflare control devices to comply with 40 CFR Part 63, Subpart TT shall comply with the provisions of 40 CFR Part 63, Subpart SS, except as provided in 63.1002(b).

(2) The Permittee who owns or operates closed vent systems and flares to comply with the provisions of 40 CFR Part 63, Subpart TT shall design and operate the flare as specified in 40 CFR Part 63, Subpart SS, except as provided in 40 CFR 63.1002(b).

(3) The Permittee who routs emissions from equipment leaks to a fuel gas system or process shall comply with the provisions of 40 CFR Part 63, Subpart SS, except as provided in 63.1002(b).

JJ.15 Alternative means of emission limitation: Enclosed-vented process units. [326 IAC 14][40 CFR 63.1016, Subpart JJ]

(a) Pursuant to 40 CFR 63.1016(a); Use of closed vent system and control device. Process units of affected facilities or portions of process units of affected facilities enclosed in such a manner that all emissions from equipment leaks are routed to a process or fuel gas system or collected and vented through a closed vent system to a control device meeting the requirements of either 40 CFR 63.1015 or 63.1002(b) are exempt from the requirements of 40 CFR 63.1006 through 63.1014. The enclosure shall be maintained under a negative pressure at all times while the process unit or affected facility is in operation to ensure that all emissions are routed to a control device.

(b) Pursuant to 40 CFR 63.1016(b); Recordkeeping. The Permittee who chooses to comply with the requirements of 63.1016 shall maintain the records specified in 40 CFR 63.1016(b)(1) through 63.1016(b)(3).

(1) Identification of the process unit(s) or affected facilities and the regulated materials they handle.

(2) A schematic of the process unit or affected facility, enclosure, and closed vent system.

(3) A description of the system used to create a negative pressure in the enclosure to ensure that all emissions are routed to the control device.

Record Keeping and Reporting Requirement

JJ.16 Recordkeeping requirements. [326 IAC 14][40 CFR 63.1017, Subpart JJ]

(a) Pursuant to 40 CFR 63.1017(a);Recordkeeping system. The Permittee who owns or operates more than one regulated source subject to the provisions of 40 CFR Part 63, Subpart TT may comply with the recordkeeping requirements for these regulated sources in one recordkeeping system. The recordkeeping system shall identify each record by regulated source and the type of program being implemented (e.g., quarterly monitoring) for each type of equipment. The records required by 40 CFR Part 63, Subpart TT are summarized in 40 CFR 63.1017(b) and 63.1017(c).

(b) Pursuant to 40 CFR 63.1017(b); General equipment leak records.

(1) As specified in 40 CFR 63.1003(a) through 63.1003(d), the Permittee shall keep general and specific equipment identification if the equipment is not physically tagged and the Permittee is electing to identify the equipment subject to 40 CFR Part 63, Subpart TT through written documentation such as a log or other designation.

(2) The Permittee shall keep a written plan as specified in 40 CFR 63.1003(c)(5) for any equipment that is designated as unsafe or difficult-to-monitor.

(3) The Permittee shall maintain the identity and an explanation as specified in 40 CFR 63.1003(d)(1) for any equipment that is designated as unsafe-to-repair.

(4) As specified in 40 CFR 63.1003(e), the Permittee shall maintain the identity of compressors operating with an instrument reading of less than 500 parts per million.

(5) The Permittee shall keep records for leaking equipment as specified in 40 CFR 63.1004(e).

(6) The Permittee shall keep records for delay of repair as specified in 40 CFR 63.1005(c) and records for leak repair as specified in 63.1005(e).

(c) Pursuant to 40 CFR 63.1017(c); Specific equipment leak records.

(1) For valves, the Permittee shall maintain the monitoring schedule for each process unit as specified in 40 CFR 63.1006(b), and the records specified in 63.1006(e)(4)(i)(B).

(2) For pumps, the Permittee shall maintain the records specified in 40 CFR 63.1017(c)(2)(i) through 63.1017(c)(2)(iii).

(i) Documentation of pump visual inspections as specified in 40 CFR 63.1007(b)(4).

(ii) Documentation of dual mechanical seal pump visual inspections as specified in 40 CFR 63.1007(e)(1)(v).

(iii) For the criteria as to the presence and frequency of drips for dual mechanical seal pumps, records of the design criteria and explanations and any changes and the reason for the changes, as specified in 40 CFR 63.1007(e)(1)(i).

(3) [Reserved]

(4) For agitators, the Permittee shall maintain records specified in 40 CFR 63.1017(c)(4)(i) and 63.1017(c)(4)(ii).

(i) Documentation of the agitator seal visual inspections as specified in 40 CFR 63.1009(b)(3).

(ii) Documentation of the design criteria and explanations and any changes and the reason for the changes, as specified in 40 CFR 63.1009(e)(1)(vi)(A).

(5) For pressure relief devices in gas and vapor or light liquid service, the Permittee shall keep records of the dates and results of monitoring following a pressure release, as specified in 40 CFR 63.1011(c)(3).

(6) For compressors, the Permittee shall maintain the records specified in 40 CFR 63.1017(c)(6)(i) and 63.1017(c)(6)(ii).

(i) For criteria as to failure of the seal system and/or the barrier fluid system, record the design criteria and explanations and any changes and the reason for the changes, as specified in 40 CFR 63.1012(d)(2).

(ii) For compressors operating under the alternative compressor standard, record the dates and results of each compliance test as specified in 40 CFR 63.1012(f)(2).

(7) For process units complying with the enclosed-vented process unit alternative, the Permittee shall maintain the records for enclosed-vented process units as specified in 40 CFR 63.1016(b).

JJ.17 Reporting requirements. [326 IAC 14][40 CFR 63.1018, Subpart JJ]

(a) Pursuant to 40 CFR 63.1018(a); Periodic Reports. The Permittee shall report the information specified in 40 CFR 63.1018(a)(1) through 63.1018(a)(2), as applicable, in the periodic report specified in the referencing subpart.

(1) The initial Periodic Report shall include the information specified in 40 CFR 63.1018(a)(1)(i) through 63.1018(a)(1)(iv) and 63.1018(a)(2).

(i) Process unit or affected facility identification.

(ii) Number of valves subject to the requirements of 40 CFR 63.1006, excluding those valves designated for no detectable emissions under the provisions of 40 CFR 63.1006(e)(4).

(iii) Number of pumps subject to the requirements of 40 CFR 63.1007, excluding those pumps designated for no detectable emissions under the

provisions of 40 CFR 63.1007(e)(2) and those pumps complying with the closed vent system provisions of 40 CFR 63.1007(e)(3).

(iv) Number of compressors subject to the requirements of 40 CFR 63.1012, excluding those compressors designated for no detectable emissions under the provisions of 40 CFR 63.1012(f) and those compressors complying with the closed vent system provisions of 40 CFR 63.1012(e).

(2) Each periodic report shall contain the information listed in 40 CFR 63.1018(a)(2)(i) through 63.1018(a)(2)(iv), as applicable.

(i) Process unit identification.

(ii) For each month during the semiannual reporting period,

(A) Number of valves for which leaks were detected as described in 40 CFR 63.1006(b),

(B) Number of valves for which leaks were not repaired as required in 40 CFR 63.1006(d),

(C) Number of pumps for which leaks were detected as described in 40 CFR 63.1007(b) and 63.1007(e)(1)(vi),

(D) Number of pumps for which leaks were not repaired as required in 40 CFR 63.1007(d) and 63.1007(e)(5),

(E) Number of compressors for which leaks were detected as described in 40 CFR 63.1012(d)(1),

(F) Number of compressors for which leaks were not repaired as required in 40 CFR 63.1012(d)(1), and

(G) The facts that explain each delay of repair and, where appropriate, why the repair was technically infeasible without a process unit or affected facility shutdown.

(iii) Dates of process unit or affected facility shutdowns which occurred within the periodic report reporting period.

(iv) Revisions to items reported according to 40 CFR 63.1018(a)(1) if changes have occurred since the initial report or subsequent revisions to the initial report.

(b) Pursuant to 40 CFR 63.1018(b); Special notifications. The Permittee electing to comply with either of the alternatives in 40 CFR 63.1006(b)(5) or 63.1006(b)(6) shall notify IDEM, OAQ of the alternative standard selected before implementing either of the provisions.

SECTION KK 40 CFR 60, Subpart Kb - Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984

Definitions contained in 40 CFR Part 60, Subpart Kb, Section 111b are applicable to the Permittee.

Emission Limitations and Standards

KK.1 Standard for volatile organic compounds (VOC). [326 IAC 14][40 CFR 60.112b, Subpart Kb]

(a) The Permittee of each storage vessel either with a design capacity greater than or equal to 151 m3 containing a VOL that, as stored, has a maximum true vapor pressure equal to or greater than 5.2 kPa but less than 76.6 kPa or with a design capacity greater than or equal to 75 m3 but less than 151 m3 containing a VOL that, as stored, has a maximum true vapor pressure equal to or greater than 27.6 kPa but less than 76.6 kPa, shall equip each storage vessel with one of the following:

(1) A fixed roof in combination with an internal floating roof meeting the following specifications:

(i) The internal floating roof shall rest or float on the liquid surface (but not necessarily in complete contact with it) inside a storage vessel that has a fixed roof. The internal floating roof shall be floating on the liquid surface at all times, except during initial fill and during those intervals when the storage vessel is completely emptied or subsequently emptied and refilled. When the roof is resting on the leg supports, the process of filling, emptying, or refilling shall be continuous and shall be accomplished as rapidly as possible.

(ii) Each internal floating roof shall be equipped with one of the following closure devices between the wall of the storage vessel and the edge of the internal floating roof:

(A) A foam or liquid filled seal mounted in contact with the liquid (liquid mounted seal). A liquid mounted seal means a foam or liquid filled seal mounted in contact with the liquid between the wall of the storage vessel and the floating roof continuously around the circumference of the tank.

(B) Two seals mounted one above the other so that each forms a continuous closure that completely covers the space between the wall of the storage vessel and the edge of the internal floating roof. The lower seal may be vapor mounted, but both must be continuous.

(C) A mechanical shoe seal. A mechanical shoe seal is a metal sheet held vertically against the wall of the storage vessel by springs or weighted levers and is connected by braces to the floating roof. A flexible coated fabric (envelope) spans the annular space between the metal sheet and the floating roof.

(iii) Each opening in a noncontact internal floating roof except for automatic bleeder vents (vacuum breaker vents) and the rim space vents is to provide a projection below the liquid surface.

(iv) Each opening in the internal floating roof except for leg sleeves, automatic bleeder vents, rim space vents, column wells, ladder wells, sample wells, and stub drains is to be equipped with a cover or lid which is to be maintained in a closed position at all times (i.e., no visible gap)

except when the device is in actual use. The cover or lid shall be equipped with a gasket. Covers on each access hatch and automatic gauge float well shall be bolted except when they are in use.

(v) Automatic bleeder vents shall be equipped with a gasket and are to be closed at all times when the roof is floating except when the roof is being floated off or is being landed on the roof leg supports.

(vi) Rim space vents shall be equipped with a gasket and are to be set to open only when the internal floating roof is not floating or at the manufacturer's recommended setting.

(vii) Each penetration of the internal floating roof for the purpose of sampling shall be a sample well. The sample well shall have a slit fabric cover that covers at least 90 percent of the opening.

(viii) Each penetration of the internal floating roof that allows for passage of a column supporting the fixed roof shall have a flexible fabric sleeve seal or a gasketed sliding cover.

(ix) Each penetration of the internal floating roof that allows for passage of a ladder shall have a gasketed sliding cover.

(2) An external floating roof. An external floating roof means a pontoon type or double deck type cover that rests on the liquid surface in a vessel with no fixed roof. Each external floating roof must meet the following specifications:

(i) Each external floating roof shall be equipped with a closure device between the wall of the storage vessel and the roof edge. The closure device is to consist of two seals, one above the other. The lower seal is referred to as the primary seal, and the upper seal is referred to as the secondary seal.

(A) The primary seal shall be either a mechanical shoe seal or a liquid mounted seal. Except as provided in 40 CFR 60.113b(b)(4), the seal shall completely cover the annular space between the edge of the floating roof and tank wall.

(B) The secondary seal shall completely cover the annular space between the external floating roof and the wall of the storage vessel in a continuous fashion except as allowed in 40 CFR 60.113b(b)(4).

(ii) Except for automatic bleeder vents and rim space vents, each opening in a noncontact external floating roof shall provide a projection below the liquid surface. Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof is to be equipped with a gasketed cover, seal, or lid that is to be maintained in a closed position at all times (i.e., no visible gap) except when the device is in actual use. Automatic bleeder vents are to be closed at all times when the roof is floating except when the roof is being floated off or is being landed on the roof leg supports. Rim vents are to be set to open when the roof is being floated off the roof legs supports or at the manufacturer's recommended setting. Automatic bleeder vents and rim space vents are to be gasketed. Each emergency roof drain is to be provided with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening.

(iii) The roof shall be floating on the liquid at all times (i.e., off the roof leg supports) except during initial fill until the roof is lifted off leg supports and when the tank is completely emptied and subsequently refilled. The process of filling, emptying, or refilling when the roof is resting on the leg supports shall be continuous and shall be accomplished as rapidly as possible.

(3) A closed vent system and control device meeting the following specifications:

(i) The closed vent system shall be designed to collect all VOC vapors and gases discharged from the storage vessel and operated with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background and visual inspections, as determined in 40 CFR Part 60, Subpart VV, 60.485(b).

(ii) The control device shall be designed and operated to reduce inlet VOC emissions by 95 percent or greater. If a flare is used as the control device, it shall meet the specifications described in the general control device requirements (40 CFR 60.18) of the General Provisions.

(4) A system equivalent to those described in paragraphs 40 CFR 60.112b(a)(1), 60.112b(a)(2), or 60.112b(a)(3) as provided in 40 CFR 60.114b.

(b) [Reserved]

(c) [Reserved]

Compliance Determination Requirements

KK.2 Testing and procedures. [326 IAC 14][40 CFR 60.113b, Subpart Kb]

(a) [Reserved]

(b) [Reserved]

(c) The Permittee of each source that is equipped with a closed vent system and control device as required in 40 CFR 60.112b(a)(3) or 60.112b(b)(2) (other than a flare) is exempt from 40 CFR 60.8 of the General Provisions and shall meet the following requirements.

(1) Submit for approval by IDEM, OAQ as an attachment to the notification required by 40 CFR 60.7(a)(1) or, if the facility is exempt from 40 CFR 60.7(a)(1), as an attachment to the notification required by 40 CFR 60.7(a)(2), an operating plan containing the information listed below.

(i) Documentation demonstrating that the control device will achieve the required control efficiency during maximum loading conditions. This documentation is to include a description of the gas stream which enters the control device, including flow and VOC content under varying liquid level conditions (dynamic and static) and manufacturer's design specifications for the control device. If the control device or the closed vent capture system receives vapors, gases, or liquids other than fuels from sources that are not designated sources under this subpart, the efficiency demonstration is to include consideration of all vapors, gases, and liquids received by the closed vent capture system and control device. If an enclosed combustion device with a minimum residence time of 0.75 seconds and a minimum temperature of 816 □C is used to meet the 95 percent requirement, documentation that those conditions will exist is sufficient to meet the requirements of this paragraph.

(ii) A description of the parameter or parameters to be monitored to ensure that the control device will be operated in conformance with its design and an explanation of the criteria used for selection of that parameter (or parameters).

(2) Operate the closed vent system and control device and monitor the parameters of the closed vent system and control device in accordance with the operating plan submitted to IDEM, OAQ in accordance with 40 CFR 60.113b(c)(1), unless the plan was modified by IDEM, OAQ during the review process. In this case, the modified plan applies.

(d) [Reserved]

Record Keeping and Reporting Requirement

KK.3 Reporting and recordkeeping requirements. [326 IAC 14][40 CFR 60.115b, Subpart Kb]

The Permittee of each storage vessel as specified in 40 CFR 60.112b(a) shall keep records and furnish reports as required by 40 CFR 60.115b(a), 60.115b(b), or 60.115b(c) depending upon the control equipment installed to meet the requirements of 40 CFR 60.112b. The Permittee shall keep copies of all reports and records required by 40 CFR 60.115b, except for the record required by 60.115b(c)(1), for at least 2 years. The record required by 60.115b(c)(1) will be kept for the life of the control equipment.

(a) [Reserved]

(b) [Reserved]

(c) After installing control equipment in accordance with 40 CFR 60.112b(a)(3) or 60.112b(b)(1) (closed vent system and control device other than a flare), the Permittee shall keep the following records.

(1) A copy of the operating plan.

(2) A record of the measured values of the parameters monitored in accordance with 40 CFR 60.113b(c)(2).

(d) [Reserved]

KK.4 Monitoring of operations. [326 IAC 14][40 CFR 60.116b, Subpart Kb]

(a) The Permittee shall keep copies of all records required by 40 CFR 60.116b, except for the record required by 40 CFR 60.116b(b), for at least 2 years. The record required by 40 CFR 60.116b(b) will be kept for the life of the source.

(b) The Permittee of each storage vessel as specified in 40 CFR 60.110b(a) shall keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel.

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

SECTION MM 40 CFR Part 63, Subpart I National Emission Standards For Organic Hazardous Air Pollutants For Certain Processes Subject To The Negotiated Regulation For Equipment Leaks

Definitions contained in 40 CFR Part 63, Subpart I, Section 191 are applicable to the Permittee.

Emissions Limitations and Standards [326 IAC 2-7-5(1)]

MM.1 Standard [326 IAC 14][40 CFR 63.192, Subpart I]

(a) [Reserved]

(b) [Reserved]

(c) [Reserved]

(d) [Reserved]

(e) [Reserved]

(f) Pursuant to 40 CFR 63.192(f), each Permittee of a source subject to 40 CFR Part 63, Subparts I and H shall keep copies of all applicable reports and records required by Subpart H for at least 2 years, except as otherwise specified in 40 CFR Part 63, Subpart H. If the Permittee submits copies of reports to the applicable EPA Regional Office, the Permittee is not required to maintain copies of reports. If the EPA Regional Office has waived the requirement of 40 CFR 63.10(a)(4)(ii) for submittal of copies of reports, the Permittee is not required to maintain copies of reports.

(1) All applicable records shall be maintained in such a manner that they can be readily accessed. The most recent 6 months of records shall be retained on site or shall be accessible from a central location by computer or other means that provides access within 2 hours after a request.

(2) The Permittee subject to 40 CFR Part 63, Subparts I and H shall keep the records specified in 40 CFR 63.192(f)(2), as well as records specified in 40 CFR Part 63, Subpart H.

(i) Records of the occurrence and duration of each start up, shutdown, and malfunction of operation of a process subject to 40 CFR Part 63, Subpart I as specified in 40 CFR 63.190(b).

(ii) Records of the occurrence and duration of each malfunction of air pollution control equipment or continuous monitoring systems used to comply with 40 CFR Part 63, Subparts I and H.

(iii) For each start up, shutdown, and malfunction, records that the procedures specified in the source's start up, shutdown, and malfunction plan were followed, and documentation of actions taken that are not consistent with the plan. These records may take the form of a “checklist,” or other form of recordkeeping that confirms conformance with the startup, shutdown, and malfunction plan for the event.

(g) Pursuant to 40 CFR 63.192(g), all reports required under 40 CFR Part 63, Subpart H shall be sent to US EPA at the addresses listed in 40 CFR 63.13 of Subpart A.

(1) Wherever 40 CFR Part 63, Subpart A specifies “postmark” dates, submittals may be sent by methods other than the U.S. Mail (e.g., by fax or courier). Submittals shall be sent on or before the specified date.

(2) If acceptable to the US EPA, IDEM, OAQ, and the Permittee of a source, reports may be submitted on electronic media.

(h) [Reserved]

(i) [Reserved]

SECTION LL 40 CFR Part 63, Subpart JJJJ - National Emission Standards For Hazardous Air Pollutants: Paper and Other Web Coating

Definitions contained in 40 CFR Part 63, Subpart JJJJ, Section 3310 are applicable to the Permittee.

Emissions Limitations and Standards [326 IAC 2-7-5(1)]

LL.1 What emission standards must the Permittee meet? [326 IAC 14][40 CFR 63.3320, Subpart JJJJ]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.3320(b), the Permittee must limit organic HAP emissions to the level specified in 40 CFR Part 63.3320(b)(1), 63.3320(b)(2), 63.3320(b)(3), or 63.3320(b)(4).

(1) No more than 5 percent of the organic HAP applied for each month (95 percent reduction) at existing affected sources, and no more than 2 percent of the organic HAP applied for each month (98 percent reduction) at new affected sources; or

(2) No more than 4 percent of the mass of coating materials applied for each month at existing affected sources, and no more than 1.6 percent of the mass of coating materials applied for each month at new affected sources; or

(3) No more than 20 percent of the mass of coating solids applied for each month at existing affected sources, and no more than 8 percent of the coating solids applied for each month at new affected sources.

(4) [Reserved]

(c) Pursuant to 40 CFR 63.3320(c), the Permittee must demonstrate compliance with 40 CFR Part 63, Subpart JJJJ by following the procedures in 40 CFR Part 63.3370.

Compliance Determination Requirements

LL.2 What performance tests must the Permittee conduct? [326 IAC 14][40 CFR 63.3360 Subpart JJJJ]

(a) Pursuant to 40 CFR 63.3360(a), the Permittee must conduct the performance test methods as follows if organic HAP on any individual web coating line or any group of web coating lines is controlled by:

(1) Limiting organic HAP or volatile matter content of coatings. The Permittee must determine the organic HAP or volatile matter and coating solids content of coating materials according to procedures in 40 CFR Part 63.3360(c) and 63.3360(d). The Permittee must determine the mass of volatile matter retained in the coated web or otherwise not emitted to the atmosphere according to 40 CFR Part 63.3360(g).

(2) [Reserved]

(b) [Reserved]

(c) Pursuant to 40 CFR 63.3360(c), if the Permittee determines compliance with the emission standards in 40 CFR Part 63.3320 by means other than determining the overall organic HAP control efficiency of a control device, the Permittee must determine the organic HAP mass fraction of each coating material “as-purchased” by following one of the procedures in 40 CFR Parts 63.3360(c)(1) through 63.3360(c)(3), and determine the organic HAP mass fraction of each coating material “as-applied” by following the procedures in 40 CFR 63.3360(c)(4). If the organic HAP content values are not

determined using the procedures in 40 CFR 63.3360(c)(1) through 63.3360(c)(3), the Permittee must submit an alternative test method for determining their values for approval by IDEM, OAQ in accordance with 40 CFR 63.7(f). The recovery efficiency of the test method must be determined for all of the target organic HAP and a correction factor, if necessary, must be determined and applied.

(1) Method 311. The Permittee may test the coating material in accordance with Method 311 of 40 CFR Part 63, Appendix A. The Method 311 determination may be performed by the manufacturer of the coating material and the results provided to the Permittee. The organic HAP content must be calculated according to the criteria and procedures in 40 CFR 63.3360(c)(1)(i) through 63.3360(c)(1)(iii).

(i) Include each organic HAP determined to be present at greater than or equal to 0.1 mass percent for Occupational Safety and Health Administration (OSHA)-defined carcinogens as specified in 29 CFR 1910.1200(d)(4) and greater than or equal to 1.0 mass percent for other organic HAP compounds.

(ii) Express the mass fraction of each organic HAP according to 40 CFR 63.3360(c)(1)(i) as a value truncated to four places after the decimal point (for example, 0.3791).

(iii) Calculate the total mass fraction of organic HAP in the tested material by summing the counted individual organic HAP mass fractions and truncating the result to three places after the decimal point (for example, 0.763).

(2) Method 24. For coatings, determine the volatile organic content as mass fraction of nonaqueous volatile matter and use it as a substitute for organic HAP using Method 24 of 40 CFR Part 60, Appendix A. The Method 24 determination may be performed by the manufacturer of the coating and the results provided to the Permittee.

(3) Formulation data. The Permittee may use formulation data to determine the organic HAP mass fraction of a coating material. Formulation data may be provided to the Permittee by the manufacturer of the material. In the event of an inconsistency between Method 311 (Appendix A of 40 CFR Part 63) test data and a facility's formulation data, and the Method 311 test value is higher, the Method 311 data will govern. Formulation data may be used provided that the information represents all organic HAP present at a level equal to or greater than 0.1 percent for OSHA-defined carcinogens as specified in 29 CFR 1910.1200(d)(4) and equal to or greater than 1.0 percent for other organic HAP compounds in any raw material used.

(4) As-applied organic HAP mass fraction. If the as-purchased coating material is applied to the web without any solvent or other material added, then the as-applied organic HAP mass fraction is equal to the as-purchased organic HAP mass fraction. Otherwise, the as-applied organic HAP mass fraction must be calculated using Equation 1a of 40 CFR 63.3370.

(d) Pursuant to 40 CFR 63.3360(d), if the Permittee determines compliance with the emission standards in 40 CFR 63.3320 by means other than determining the overall organic HAP control efficiency of a control device and the Permittee chooses to use the volatile organic content as a surrogate for the organic HAP content of coatings, the Permittee must determine the as-purchased volatile organic content and coating solids content of each coating material applied by following the procedures in 40 CFR 63.3360(d)(1) or 63.3360(d)(2), and the as-applied volatile organic content and coating

solids content of each coating material by following the procedures in paragraph 40 CFR 63.3360(d)(3).

(1) Method 24. The Permittee may determine the volatile organic and coating solids mass fraction of each coating applied using Method 24 (40 CFR Part 60, Appendix A.) The Method 24 determination may be performed by the manufacturer of the material and the results provided to the Permittee. If these values cannot be determined using Method 24, the Permittee must submit an alternative technique for determining their values for approval by IDEM, OAQ.

(2) Formulation data. The Permittee may determine the volatile organic content and coating solids content of a coating material based on formulation data and may rely on volatile organic content data provided by the manufacturer of the material. In the event of any inconsistency between the formulation data and the results of Method 24 of 40 CFR Part 60, Appendix A, and the Method 24 results are higher, the results of Method 24 will govern.

(3) As-applied volatile organic content and coating solids content. If the as-purchased coating material is applied to the web without any solvent or other material added, then the as-applied volatile organic content is equal to the as-purchased volatile content and the as-applied coating solids content is equal to the as-purchased coating solids content. Otherwise, the as-applied volatile organic content must be calculated using Equation 1b of 40 CFR 63.3370 and the as-applied coating solids content must be calculated using Equation 2 of 40 CFR 63.3370.

(e) [Reserved]

(f) [Reserved]

(g) Pursuant to 40 CFR 63.3360(g), the Permittee may choose to take into account the mass of volatile matter retained in the coated web after curing or drying or otherwise not emitted to the atmosphere when determining compliance with the emission standards in 40 CFR 63.3320. If the Permittee chooses this option, the Permittee must develop a testing protocol to determine the mass of volatile matter retained in the coated web or otherwise not emitted to the atmosphere and submit this protocol to IDEM, OAQ for approval. The Permittee must submit this testing protocol with a site-specific test plan under 40 CFR 63.7(f). If the Permittee intends to take into account the mass of volatile matter retained in the coated web after curing or drying or otherwise not emitted to the atmosphere and demonstrate compliance according to 40 CFR 63.3370(c)(3), 63.3370(c)(4), 63.3370(c)(5), or 63.3370(d), then the test protocol must determine the mass of organic HAP retained in the coated web or otherwise not emitted to the atmosphere. Otherwise, compliance must be shown using the volatile organic matter content as a surrogate for the HAP content of the coatings.

(h) [Reserved]

LL.3 How does the Permittee demonstrate compliance with the emission standards? [326 IAC 14][40 CFR 63.3370 Subpart JJJJ]

(a) Pursuant to 40 CFR 63.3370(a), the Permittee must demonstrate compliance follows:

(1) If the Permittee chooses to demonstrate compliance with “as-purchased" compliant coating materials then the Permittee must demonstrate that:

(i) Each coating material used at an existing affected source does not exceed 0.04 kg organic HAP per kg coating material, and each coating material used at a new affected source does not exceed 0.016 kg

organic HAP per kg coating material as-purchased. These procedures are set out in 40 CFR 63.3370(b); or.

(ii) Each coating material used at an existing affected source does not exceed 0.2 kg organic HAP per kg coating solids, and each coating material used at a new affected source does not exceed 0.08 kg organic HAP per kg coating solids as-purchased. These procedures are set out in 40 CFR 63.3370(b).

(2) If the Permittee chooses to demonstrate compliance with "as-applied" compliant coating materials then the Permittee must demonstrate that:

(i) Each coating material used at an existing affected source does not exceed 0.04 kg organic HAP per kg coating material, and each coating material used at a new affected source does not exceed 0.016 kg organic HAP per kg coating material as-applied. These procedures are set out in 40 CFR 63.3370(c)(1). Use either Equation 1a or 1b of 40 CFR 63.3370 to determine compliance with 63.3320(b)(2) in accordance with 63.3370(c)(5)(i); or

(ii) Each coating material used at an existing affected source does not exceed 0.2 kg organic HAP per kg coating solids, and each coating material used at a new affected source does not exceed 0.08 kg organic HAP per kg coating solids as-applied. These procedures are set out in 40 CFR 63.3370(c)(2). Use Equations 2 and 3 of 40 CFR 63.3370 to determine compliance with 63.3320(b)(3) in accordance with 63.3370(c)(5)(i); or

(iii) Monthly average of all coating materials used at an existing affected source does not exceed 0.04 kg organic HAP per kg coating material, and monthly average of all coating materials used at a new affected source does not exceed 0.016 kg organic HAP per kg coating material as applied on a monthly average basis. These procedures are set out in 40 CFR 63.3370(c)(3). Use Equation 4 of 63.3370 to determine compliance with 63.3320(b)(2) in accordance with 63.3370(c)(5)(ii); or

(iv) Monthly average of all coating materials used at an existing affected source does not exceed 0.2 kg organic HAP per kg coating solids, and monthly average of all coating materials used at a new affected source does not exceed 0.08 kg organic HAP per kg coating solids as-applied on a monthly average basis. These procedures are set out in 40 CFR 63.3370(c)(4). Use Equation 5 of 63.3370 to determine compliance with 63.3320(b)(3) in accordance with 63.3370(c)(5)(ii).

(3) If the Permittee chooses to demonstrate compliance by tracking total monthly organic HAP applied then the Permittee must demonstrate that:

(i) Total monthly organic HAP applied does not exceed the calculated limit based on emission limitations. To accomplish this follow the procedures set out in 40 CFR 63.3370(d). Show that total monthly HAP applied (Equation 6 of 63.3370) is less than the calculated equivalent allowable organic HAP (Equation 13a or b of 63.3370).

(4) [Reserved]

(5) [Reserved]

(6) [Reserved]

(b) Pursuant to 40 CFR 63.3370(b), as-purchased "compliant" coating materials.

(1) If the Permittee complies by using coating materials that individually meet the emission standards in 40 CFR 63.3320(b)(2) or 63.3320(b)(3), the Permittee must demonstrate that each coating material applied during the month at an existing affected source contains no more than 0.04 mass fraction organic HAP or 0.2 kg organic HAP per kg coating solids, and that each coating material applied during the month at a new affected source contains no more than 0.016 mass fraction organic HAP or 0.08 kg organic HAP per kg coating solids on an as-purchased basis as determined in accordance with 40 CFR 63.3360(c).

(2) The Permittee is in compliance with emission standards in 40 CFR 63.3320(b)(2) and 63.3320(b)(3) if each coating material applied at an existing affected source is applied as-purchased and contains no more than 0.04 kg organic HAP per kg coating material or 0.2 kg organic HAP per kg coating solids, and each coating material applied at a new affected source is applied as-purchased and contains no more than 0.016 kg organic HAP per kg coating material or 0.08 kg organic HAP per kg coating solids.

(c) Pursuant to 40 CFR 63.3370(c), if the Permittee complies by using coating materials that meet the emission standards in 40 CFR 63.3320(b)(2) or 63.3320(b)(3) as-applied, the Permittee must demonstrate compliance by following one of the procedures in 40 CFR 63.3370(c)(1) through 63.3370(c)(4). Compliance is determined in accordance with 40 CFR 63.3370(c)(5).

(1) To show that each coating material as-applied meets the mass fraction of coating material standard (40 CFR 63.3320(b)(2)), the Permittee must demonstrate that each coating material applied at an existing affected source during the month contains no more than 0.04 kg organic HAP per kg coating material applied, and each coating material applied at a new affected source contains no more than 0.016 kg organic HAP per kg coating material applied as determined in accordance with 40 CFR 63.3370(c)(1)(i) and 63.3370(c)(1)(ii). The Permittee must calculate the as-applied organic HAP content of as-purchased coating materials which are reduced, thinned, or diluted prior to application.

(i) Determine the organic HAP content or volatile organic content of each coating material applied on an as-purchased basis in accordance with 40 CFR 63.3360(c).

(ii) Calculate the as-applied organic HAP content of each coating material using Equation 1a of 40 CFR 63.3370:

$$C_{ahi} = \frac{\left(C_{hi} M_i + \sum_{j=1}^{q} C_{hij} M_{ij} \right)}{M_i + \sum_{j=1}^{q} M_{ij}} \qquad \text{Eq. 1a}$$

Where:

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i, expressed as a mass fraction, kg/kg.

C_{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = number of different materials added to the coating material.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, kg/kg.

M^{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

or calculate the as-applied volatile organic content of each coating material using Equation 1b of 40 CFR 63.3370:

$$C_{avi} = \frac{\left(C_{vi}M_i + \sum_{j=1}^{q} C_{vij}M_{ij}\right)}{M_i + \sum_{j=1}^{q} M_{ij}} \qquad \text{Eq. 1b}$$

Where:

C_{avi} = Monthly average, as-applied, volatile organic content of coating material, i, expressed as a mass fraction, kg/kg.

C_{vi} = Volatile organic content of coating material, i, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = Number of different materials added to the coating material.

C_{vij} = Volatile organic content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, kg/kg.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

(2) To show that each coating material as-applied meets the mass fraction of coating solids standard (40 CFR 63.3320(b)(3)) the Permittee must demonstrate that each coating material applied at an existing affected source contains no more than 0.20 kg of organic HAP per kg of coating solids applied and each coating material applied at a new affected source contains no more than 0.08 kg of organic HAP per kg of coating solids applied. The Permittee must demonstrate compliance in accordance with 40 CFR 63.3370(c)(2)(i) and 63.3370(c)(2)(ii).

(i) Determine the as-applied coating solids content of each coating material following the procedure in 40 CFR 63.3360(d). The Permittee must calculate the as-applied coating solids content of coating materials which are reduced, thinned, or diluted prior to application, using Equation 2 of 40 CFR 63.3370:

$$C_{asi} = \frac{\left(C_{si}M_i + \sum_{j=1}^{q} C_{sij}M_{ij}\right)}{M_i + \sum_{j=1}^{q} M_{ij}} \qquad \text{Eq. 2}$$

Where:

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = Number of different materials added to the coating material.

C_{sij} = Coating solids content of material, j, added to as-purchased coating material, i, expressed as a mass-fraction, kg/kg.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

(ii) Calculate the as-applied organic HAP to coating solids ratio using Equation 3 of 40 CFR 63.3370:

$$H_{si} = \frac{C_{ahi}}{C_{asi}} \qquad \text{Eq. 3}$$

Where:

H_{si} = As-applied, organic HAP to coating solids ratio of coating material, i.

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i, expressed as a mass fraction, kg/kg.

C_{asi} = Monthly average, as-applied, coating solids content of coating material, i, expressed as a mass fraction, kg/kg.

(3) To show that the monthly average organic HAP content of all coating materials as-applied is less than the mass percent limit (40 CFR 63.3320(b)(2)) the Permittee must demonstrate that the monthly average as-applied organic HAP content of all coating materials applied at an existing affected source is less than 0.04 kg organic HAP per kg of coating material applied, and all coating materials applied at a new affected source are less than 0.016 kg organic HAP per kg of coating material applied, as determined by Equation 4 of 40 CFR 63.3370:

$$H_L = \frac{\sum_{i=1}^{p} C_{hi} M_i + \sum_{j=1}^{q} C_{hij} M_{ij} - M_{vret}}{\sum_{i=1}^{p} M_i + \sum_{j=1}^{q} M_{ij}} \qquad \text{Eq. 4}$$

Where:

H_L = Monthly average, as-applied, organic HAP content of all coating materials applied, expressed as kg organic HAP per kg of coating material applied, kg/kg.

p = Number of different coating materials applied in a month.

C^{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = Number of different materials added to the coating material.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, kg/kg.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, kg. The value of this term will be zero in all cases except where the Permittee chooses to take into account the volatile matter retained in the coated web or otherwise not emitted to the atmosphere for the compliance demonstration procedures in 40 CFR 63.3370.

(4) To show that the monthly average organic HAP content of all coating materials as-applied is less than the mass fraction of coating solids limit (40 CFR 63.3320(b)(3)) the Permittee must demonstrate that the monthly average as-applied organic HAP content on the basis of coating solids applied of all coating materials applied at an existing affected source is less than 0.20 kg organic HAP per kg coating solids applied, and all coating materials applied at a new affected source are less than 0.08 kg organic HAP per kg coating solids applied, as determined by Equation 5 of 40 CFR 63.3370:

$$H_S = \frac{\sum_{i=1}^{p} C_{hi} M_i + \sum_{j=1}^{q} C_{hij} M_{ij} - M_{vret}}{\sum_{i=1}^{p} C_{Si} M_i + \sum_{j=1}^{q} C_{Sij} M_{ij}} \qquad \text{Eq. 5}$$

Where:

H_s = Monthly average, as-applied, organic HAP to coating solids ratio, kg organic HAP/kg coating solids applied.

p = Number of different coating materials applied in a month.

C_{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = Number of different materials added to the coating material.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, kg/kg.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, kg. The value of this term will be zero in all cases except where the

Permittee chooses to take into account the volatile matter retained in the coated web or otherwise not emitted to the atmosphere for the compliance demonstration procedures in 40 CFR 63.3370.

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, kg/kg.

C_{sij} = Coating solids content of material, j, added to as-purchased coating material, i, expressed as a mass-fraction, kg/kg.

(5) The affected source is in compliance with emission standards in 40 CFR 63.3320(b)(2) or 63.3320(b)(3) if:

(i) The organic HAP content of each coating material as-applied at an existing affected source is no more than 0.04 kg organic HAP per kg coating material or 0.2 kg organic HAP per kg coating solids, and the organic HAP content of each coating material as-applied at a new affected source contains no more than 0.016 kg organic HAP per kg coating material or 0.08 kg organic HAP per kg coating solids; or

(ii) The monthly average organic HAP content of all as-applied coating materials at an existing affected source are no more than 0.04 kg organic HAP per kg coating material or 0.2 kg organic HAP per kg coating solids, and the monthly average organic HAP content of all as-applied coating materials at a new affected source is no more than 0.016 kg organic HAP per kg coating material or 0.08 kg organic HAP per kg coating solids.

(d) Pursuant to 40 CFR 63.3370(d), the Permittee must demonstrate that the total monthly organic HAP applied as determined by Equation 6 of 40 CFR 63.3370 is less than the calculated equivalent allowable organic HAP as determined by Equation 13a or b in 40 CFR 63.3370(l):

$$H_m = \sum_{i=1}^{p} C_{hi} M_i + \sum_{j=1}^{q} C_{hij} M_{ij} - M_{wret} \qquad \text{Eq. 6}$$

Where:

H_m = Total monthly organic HAP applied, kg.

p = Number of different coating materials applied in a month.

C_{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, kg/kg.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

q = Number of different materials added to the coating material.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, kg/kg.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, kg.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, kg. The value of this term will be zero in all cases except where the Permittee chooses to take into account the volatile matter retained in the coated web or otherwise not emitted to the atmosphere for the compliance demonstration procedures in 40 CFR 63.3370.

(e) [Reserved]

(f) [Reserved]

(g) [Reserved]

(h) [Reserved]

(i) [Reserved]

(j) [Reserved]

(k) [Reserved]

(l) Pursuant to 40 CFR 63.3370(l), to determine monthly allowable organic HAP emissions for use in demonstrating compliance in accordance with 40 CFR 63.3370(d), 63.3370(h), 63.3370(i)(1)(x)(D), 63.3370(i)(2)(xi)(D), or 63.3370(k)(3)(iv), the Permittee will need to determine the amount of coating material applied at greater than or equal to 20 mass percent coating solids and the amount of coating material applied at less than 20 mass percent coating solids. The allowable organic HAP limit is then calculated based on coating material applied at greater than or equal to 20 mass percent coating solids complying with 0.2 kg organic HAP per kg coating solids at an existing affected source or 0.08 kg organic HAP per kg coating solids at a new affected source, and coating material applied at less than 20 mass percent coating solids complying with 4 mass percent organic HAP at an existing affected source and 1.6 mass-percent organic HAP at a new affected source as follows:

(1) Determine the as-purchased mass of each coating material applied each month.

(2) Determine the as-purchased coating solids content of each coating material applied each month in accordance with 40 CFR 63.3360(d)(1).

(3) Determine the as-purchased mass fraction of each coating material which was applied at 20 mass percent or greater coating solids content on an as-applied basis.

(4) Determine the total mass of each solvent, diluent, thinner, or reducer added to coating materials which were applied at less than 20 mass percent coating solids content on an as-applied basis each month.

(5) Calculate the monthly allowable organic HAP emissions using Equation 13a of 40 CFR 63.3370 for an existing affected source:

$$H_a = 0.20\left[\sum_{i=1}^{p} M_i G_i C_{si}\right] + 0.04\left[\sum_{i=1}^{p} M_i(1-G_i) + \sum_{j=1}^{q} M_{L_j}\right] \qquad \text{Eq. 13a}$$

Where:

H_a = Monthly allowable organic HAP emissions, kg.

p = Number of different coating materials applied in a month.

M_i = mass of as-purchased coating material, i, applied in a month, kg.

G_i = Mass fraction of each coating material, i, which was applied at 20 mass percent or greater coating solids content, on an as-applied basis, kg/kg.

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, kg/kg.

q = Number of different materials added to the coating material.

M_{Lj} = Mass of non-coating-solids-containing coating material, j, added to coating-solids-containing coating materials which were applied at less than 20 mass percent coating solids content, on an as-applied basis, in a month, kg.

or Equation 13b of 40 CFR 63.3370 for a new affected source:

$$H_a = 0.08\left[\sum_{i=1}^{p} M_i G_i C_{si}\right] + 0.016\left[\sum_{i=1}^{p} M_i (1-G_i) + \sum_{j=1}^{q} M_{L_j}\right] \qquad \text{Eq. 13b}$$

Where:

H_a = Monthly allowable organic HAP emissions, kg.

p = Number of different coating materials applied in a month.

M_i = Mass of as-purchased coating material, i, applied in a month, kg.

G_i = Mass fraction of each coating material, i, which was applied at 20 mass percent or greater coating solids content, on an as-applied basis, kg/kg.

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, kg/kg.

q = Number of different materials added to the coating material.

M_{Lj} = Mass of non-coating-solids-containing coating material, j, added to coating-solids-containing coating materials which were applied at less than 20 mass percent coating solids content, on an as-applied basis, in a month, kg.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

LL.4 What notifications and reports must the Permittee submit? [326 IAC 14][40 CFR 63.3400, Subpart JJJJ]

(a) [Reserved]

(b) Pursuant to 40 CFR 63.3400(b), the Permittee must submit an initial notification as required by 40 CFR 63.9(b).

(1) Initial notification for existing affected sources must be submitted no later than 1 year before the compliance date specified in 40 CFR 63.3330(a).

(2) Initial notification for new and reconstructed affected sources must be submitted as required by 40 CFR 63.9(b).

(3) For the purpose of 40 CFR Part 63, Subpart JJJJ, a Title V or Part 70 permit application may be used in lieu of the initial notification required under 40 CFR 63.9(b), provided the same information is contained in the permit application as required by 40 CFR 63.9(b) and IDEM, OAQ to which the permit application has been submitted has an approved operating permit program under Part 70 of Chapter I and has received delegation of authority from the EPA to implement and enforce 40 CFR Part 63, Subpart JJJJ.

(4) If the Permittee chooses to use a permit application in lieu of an initial notification in accordance with 40 CFR 63.3400(b)(3), the permit application must be submitted by the same due date specified for the initial notification.

(c) Pursuant to 40 CFR 63.3400(c), the Permittee must submit a semiannual compliance report according to 40 CFR 63.3400(c)(1) and 63.3400(c)(2).

(1) Compliance report dates.

(i) The first compliance report must cover the period beginning on the compliance date that is specified for the affected source in 40 CFR 63.3330 and ending on June 30 or December 31, whichever date is the first date following the end of the calendar half immediately following the compliance date in 40 CFR 63.3330.

(ii) The first compliance report must be postmarked or delivered no later than July 31 or January 31, whichever date follows the end of the calendar half immediately following the compliance date that is specified for the affected source in 40 CFR 63.3330.

(iii) Each subsequent compliance report must cover the semiannual reporting period from January 1 through June 30 or the semiannual reporting period from July 1 through December 31.

(iv) Each subsequent compliance report must be postmarked or delivered no later than July 31 or January 31, whichever date is the first date following the end of the semiannual reporting period.

(v) For each affected source that is subject to permitting regulations pursuant to 40 CFR Part 70 or 40 CFR Part 71, and the permitting authority has established dates for submitting semiannual reports pursuant to 40 CFR 70.6(a)(3)(iii)(A) or 71.6(a)(3)(iii)(A), the Permittee may submit the first and subsequent compliance reports according to the dates IDEM, OAQ has established instead of according to the dates in 40 CFR 63.3400(c)(1)(i) through 63.3400(c)(1)(iv).

(2) The compliance report must contain the information in 40 CFR 63.3400(c)(2)(i) through 63.3400(c)(2)(vi):

(i) Company name and address.

(ii) Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.

(iii) Date of report and beginning and ending dates of the reporting period.

(iv) If there are no deviations from any emission limitations (emission limit or operating limit) that apply to the Permittee, a statement that there were no deviations from the emission limitations during the reporting period, and that no CMS was inoperative, inactive, malfunctioning, out-of-control, repaired, or adjusted.

(v) For each deviation from an emission limitation (emission limit or operating limit) that applies to the Permittee and that occurs at an affected source where a CEMS was not used to comply with the emission limitations in 40 CFR Part 63, Subpart JJJJ, the compliance report must contain the information in 40 CFR 63.3400(c)(2)(i) through 63.3400(c)(2)(iii), and:

(A) The total operating time of each affected source during the reporting period.

(B) Information on the number, duration, and cause of deviations (including unknown cause), if applicable, and the corrective action taken.

(C) Information on the number, duration, and cause for CPMS downtime incidents, if applicable, other than downtime associated with zero and span and other calibration checks.

(vi) For each deviation from an emission limit occurring at an affected source where the Permittee is using a CEMS to comply with the emission limit in 40 CFR Part 63, Subpart JJJJ, the Permittee must include the information in 40 CFR 63.3400(c)(2)(i) through 63.3400(c)(2)(iii) and 63.3400(c)(2)(vi)(A) through 63.3400(c)(2)(vi)(J).

(A) The date and time that each malfunction started and stopped.

(B) The date and time that each CEMS and CPMS, if applicable, was inoperative except for zero (low-level) and high-level checks.

(C) The date and time that each CEMS and CPMS, if applicable, was out-of-control, including the information in 40 CFR 63.8(c)(8).

(D) The date and time that each deviation started and stopped, and whether each deviation occurred during a period of startup, shutdown, or malfunction or during another period.

(E) A summary of the total duration (in hours) of each deviation during the reporting period and the total duration of each deviation as a percent of the total source operating time during that reporting period.

(F) A breakdown of the total duration of the deviations during the reporting period into those that are due to startup, shutdown, control equipment problems, process problems, other known causes, and other unknown causes.

(G) A summary of the total duration (in hours) of CEMS and CPMS downtime during the reporting period and the total duration of CEMS and CPMS downtime as a percent of the total source operating time during that reporting period.

(H) A breakdown of the total duration of CEMS and CPMS downtime during the reporting period into periods that are due to monitoring equipment malfunctions, nonmonitoring equipment malfunctions, quality assurance/quality control calibrations, other known causes, and other unknown causes.

(I) The date of the latest CEMS and CPMS certification or audit.

(J) A description of any changes in CEMS, CPMS, or controls since the last reporting period.

(d) Pursuant to 40 CFR 63.3400(d), the Permittee must submit a Notification of Performance Tests as specified in 40 CFR 63.7 and 63.9(e) if the Permittee is complying with the emission standard using a control device and the Permittee is required to conduct a performance test of the control device. The Notification of Performance Tests and the site-specific test plan required under 40 CFR 63.7(c)(2) must identify the operating parameters to be monitored to ensure that the capture efficiency of the capture system and the control efficiency of the control device determined during the performance test are maintained. Unless EPA or IDEM, OAQ objects to the parameter or requests changes, the Permittee may consider the parameter approved.

(e) Pursuant to 40 CFR 63.3400(e), the Permittee must submit a Notification of Compliance Status as specified in 40 CFR 63.9(h).

(f) [Reserved]

(g) [Reserved]

LL.5 What records must the Permittee keep? [326 IAC 14][40 CFR 63.3410, Subpart JJJJ]

(a) Pursuant to 40 CFR 63.3410(a), each Permittee of an affected source subject to 40 CFR 63.3410 must maintain the records specified in 40 CFR 63.3410(a)(1) and (2) on a monthly basis in accordance with the requirements of 40 CFR 63.10(b)(1):

(1) Records specified in 40 CFR 63.10(b)(2) of all measurements needed to demonstrate compliance with 40 CFR 63.3320, Subpart JJJJ, including:

(i) Continuous emission monitor data in accordance with the requirements of 40 CFR 63.3350(d);

(ii) Control device and capture system operating parameter data in accordance with the requirements of 40 CFR 63.3350(c), 63.3350(e), and 63.3350(f);

(iii) Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);

(iv) Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);

(v) Overall control efficiency determination using capture efficiency and control device destruction or removal efficiency test results in accordance with the requirements of 40 CFR 63.3360(e) and 63.3360(f); and

(vi) Material usage, organic HAP usage, volatile matter usage, and coating solids usage and compliance demonstrations using these data in

accordance with the requirements of 40 CFR 63.3370(b), 63.3370(c), and 63.3370(d).

(2) Records specified in 40 CFR 63.10(c) for each CMS operated by the Permittee in accordance with the requirements of 63.3350(b).

(b) [Reserved]

SECTION NN 40 CFR Part 60, Subpart DDDD - Emissions Guidelines and Compliance Times for Commercial and Industrial Solid Waste Incineration Units that Commenced Construction On or Before November 30, 1999

Definitions contained in 40 CFR Part 60, Subpart DDDD, Section 2875 are applicable to the Permittee.

Emissions Limitations and Standards [326 IAC 2-7-5(1)]

NN.1 What requirements for increments of progress and achieving final compliance must the Permittee meet? [40 CFR 60.2575]

If the Permittee plans to achieve compliance more than 1 year following the effective date of State plan approval, the Permittee must meet the two increments of progress specified in 40 CFR 60.2575(a) and 40 CFR 60.2575(b).

(a) [Reserved]

(b) Pursuant 40 CFR 60.2575(b), the Permittee must achieve final compliance.

NN.2 When must the Permittee complete each increment of progress? [40 CFR 60.2580]

Pursuant to 40 CFR 60.2580, the Permittee must achieve final compliance no later than September 1, 2005.

NN.3 What must the Permittee do if the Permittee closes the CISWI unit and then restarts it? [40 CFR 60.2610]

(a) If the Permittee closes the CISWI unit but will restart it prior to the final compliance date in the State plan, the Permittee must meet the increments of progress specified in 40 CFR 60.2575.

(b) If the Permittee closes the CISWI unit but will restart it after the final compliance date, the Permittee must complete emission control retrofits and meet the emission limitations and operating limits on the date the unit restarts operation.

NN.4 What are the operator training and qualification requirements? [40 CFR 60.2635]

(a) Pursuant to 40 CFR 60.2635(a), no CISWI unit can be operated unless a fully trained and qualified CISWI unit operator is accessible, either at the facility or can be at the facility within 1 hour. The trained and qualified CISWI unit operator may operate the CISWI unit directly or be the direct supervisor of one or more other plant personnel who operate the unit. If all qualified CISWI unit operators are temporarily not accessible, the Permittee must follow the procedures in 40 CFR 60.2665.

(b) Pursuant to 40 CFR 60.2635(b), operator training and qualification must be obtained through a State approved program or by completing the requirements included in 40 CFR 60.2635(c).

(c) Pursuant to 40 CFR 60.2635(c), training must be obtained by completing an incinerator operator training course that includes, at a minimum, the three elements described in 40 CFR 60.2635(c)(1) through (3).

(1) Training on the eleven subjects listed in 40 CFR 60.2635(c)(1)(i) through 40 CFR 60.2635(c)(1)(xi).

(i) Environmental concerns, including types of emissions.

(ii) Basic combustion principles, including products of combustion.

(iii) Operation of the specific type of incinerator to be used by the operator, including proper startup, waste charging, and shutdown procedures.

(iv) Combustion controls and monitoring.

(v) Operation of air pollution control equipment and factors affecting performance (if applicable).

(vi) Inspection and maintenance of the incinerator and air pollution control devices.

(vii) Actions to correct malfunctions or conditions that may lead to malfunction.

(viii) Bottom and fly ash characteristics and handling procedures.

(ix) Applicable Federal, State, and local regulations, including Occupational Safety and Health Administration workplace standards.

(x) Pollution prevention.

(xi) Waste management practices.

(2) An examination designed and administered by the instructor.

(3) Written material covering the training course topics that can serve as reference material following completion of the course.

NN.5 When must the operator training course be completed? [40 CFR 60.2640]

Pursuant to 40 CFR 60.2640, the operator training course must be completed by the later of the three dates specified in 40 CFR 60.2640(a) through 40 CFR 60.2640(c).

(a) The final compliance date (Increment 2).

(b) Six months after CISWI unit startup.

(c) Six months after an employee assumes responsibility for operating the CISWI unit or assumes responsibility for supervising the operation of the CISWI unit.

NN.6 How does the Permittee obtain operator qualification? [40 CFR 60.2645]

(a) Pursuant to 40 CFR 60.2645(a), the Permittee must obtain operator qualification by completing a training course that satisfies the criteria under 40 CFR 60.2635(b).

(b) Pursuant to 40 CFR 60.2645(b), qualification is valid from the date on which the training course is completed and the operator successfully passes the examination required under 40 CFR 60.2635(c)(2).

NN.7 How does the Permittee maintain the operator qualification? [40 CFR 60.2650]

Pursuant to 40 CFR 60.2650, to maintain qualification, the Permittee must complete an annual review or refresher course covering, at a minimum, the five topics described in 40 CFR 60.2650(a) through 40 CFR 60.2650(e), as specified below.

(a) Update of regulations.

(b) Incinerator operation, including startup and shutdown procedures, waste charging, and ash handling.

(c) Inspection and maintenance.

(d) Responses to malfunctions or conditions that may lead to malfunction.

(e) Discussion of operating problems encountered by attendees.

NN.8 How does the Permittee renew a lapsed operator qualification? [40 CFR 60.2655]

Pursuant to 40 CFR 60.2655, the Permittee must renew a lapsed operator qualification by one of the two methods specified in 40 CFR 60.2655(a) and 40 CFR 60.2655(b), as specified below.

(a) For a lapse of less than 3 years, the Permittee must complete a standard annual refresher course described in 40 CFR 60.2650.

(b) For a lapse of 3 years or more, the Permittee must repeat the initial qualification requirements in 40 CFR 60.2645(a).

NN.9 What site specific documentation is required? [40 CFR 60.2660]

(a) [Applicable under NN.27]

(b) 40 CFR 60.2660(b), the Permittee must establish a program for reviewing the information listed in 40 CFR 60.2660(a) with each incinerator operator.

(1) The initial review of the information listed in 40 CFR 60.2660(a) must be conducted by the later of the three dates specified in 40 CFR 60.2660(b)(1)(i) through 40 CFR 60.2660(b)(1)(iii).

(i) The final compliance date (Increment 2).

(ii) Six months after CISWI unit startup.

(iii) Six months after being assigned to operate the CISWI unit.

(2) Subsequent annual reviews of the information listed in 40 CFR 60.2660(a) must be conducted no later than 12 months following the previous review.

(c) [Applicable under NN.27]

NN.10 What emission limitations must the Permittee meet and by when? [40 CFR 60.2670]

Pursuant to 40 CFR 60.2670, the Permittee must meet the emission limitations specified in Table 2 of 40 CFR 60, Subpart DDDD on the date the initial performance test is required or completed (whichever is earlier).

NN.11 What operating limits must the Permittee meet and by when? [40 CFR 60.2675]

(a) [Reserved]

(b) Pursuant to 40 CFR 60.2675, the Permittee must meet the operating limits established during the initial performance test on the date the initial performance test is required or completed (whichever is earlier).

(c) [Reserved]

NN.12 What happens during periods of startup, shutdown, and malfunction? [40 CFR 60.2685]

(a) Pursuant to 40 CFR 60.2685(a), the emission limitations and operating limits apply at all times except during CISWI unit startups, shutdowns, or malfunctions.

(b) Pursuant to 40 CFR 60.2685(b), each malfunction must last no longer than 3 hours.

Compliance Determination Requirements

NN.13 What if the Permittee does not use a wet scrubber to comply with the emission limitations? [40 CFR 60.2680]

Pursuant to 40 CFR 60.2680, if the Permittee uses an air pollution control device other than a wet scrubber, or limit emissions in some other manner, to comply with the emission limitations under 40 CFR 60.2670, the Permittee must petition IDEM, OAQ for specific operating limits to be established during the initial performance test and continuously monitored thereafter. The Permittee must not conduct the initial performance test until after the petition has been approved by IDEM, OAQ. The petition must include the five items listed in 40 CFR 60.2680(a) through 40 CFR 60.2680(e).

(a) Identification of the specific parameters proposed to use as additional operating limits.

(b) A discussion of the relationship between these parameters and emissions of regulated pollutants, identifying how emissions of regulated pollutants change with changes in these parameters, and how limits on these parameters will serve to limit emissions of regulated pollutants.

(c) A discussion of how the Permittee will establish the upper and/or lower values for these parameters which will establish the operating limits on these parameters.

(d) A discussion identifying the methods to measure and the instruments that will be used to monitor these parameters, as well as the relative accuracy and precision of these methods and instruments.

(e) A discussion identifying the frequency and methods for recalibrating the instruments that will be used for monitoring these parameters.

NN.14 How does the Permittee conduct the initial and annual performance test? [40 CFR 60.2690]

(a) Pursuant to 40 CFR 60.2690(a), all performance tests must consist of a minimum of three test runs conducted under conditions representative of normal operations.

(b) Pursuant to 40 CFR 60.2690(b), the Permittee must document that the waste burned during the performance test is representative of the waste burned under normal operating conditions by maintaining a log of the quantity of waste burned (as required in 40 CFR 60.2740(b)(1)) and the types of waste burned during the performance test.

(c) Pursuant to 40 CFR 60.2690(c), all performance tests must be conducted using the minimum run duration specified in Table 2 of 40 CFR 60, Subpart DDDD.

(d) Pursuant to 40 CFR 60.2690(d), Method 1 of appendix A of 40 CFR 60 must be used to select the sampling location and number of traverse points.

(e) Pursuant to 40 CFR 60.2690(e), Method 3A or 3B of appendix A of 40 CFR 60 must be used for gas composition analysis, including measurement of oxygen concentration. Method 3A or 3B of appendix A of 40 CFR 60 must be used simultaneously with each method.

(f) Pursuant to 40 CFR 60.2690(f), all pollutant concentrations, except for opacity, must be adjusted to 7 percent oxygen using Equation 1 of 40 CFR 60.2690:

$$C_{adj} = C_{meas} (20.9-7)/(20.9-\%O_2) \quad \text{(Eq. 1)}$$

Where:

C_{adj} = pollutant concentration adjusted to 7 percent oxygen;

Cmeas = pollutant concentration measured on a dry basis;

(20.9-7) = 20.9 percent oxygen-7 percent oxygen (defined oxygen correction basis);

20.9 = oxygen concentration in air, percent; and

% O_2 = oxygen concentration measured on a dry basis, percent.

(g) Pursuant to 40 CFR 60.2690(g), the Permittee must determine dioxins/furans toxic equivalency by following the procedures in 40 CFR 60.2690(g)(1) through 40 CFR 60.2690(3).

(1) Measure the concentration of each dioxin/furan tetra through octa congener emitted using EPA Method 23.

(2) For each dioxin/furan congener measured in accordance with 40 CFR 60.2690(g)(1), multiply the congener concentration by its corresponding toxic equivalency factor specified in Table 4 of 40 CFR 60, Subpart DDDD.

(3) Sum the products calculated in accordance with 40 CFR 60.2690(g)(2) to obtain the total concentration of dioxins/furans emitted in terms of toxic equivalency.

NN.15 How are the performance test data used? [40 CFR 60.2695]

Pursuant to 40 CFR 60.2695, the Permittee shall use results of performance tests to demonstrate compliance with the emission limitations in Table 2 of 40 CFR 60, Subpart DDDD.

NN.16 How does the Permittee demonstrate initial compliance with the emission limitations and establish the operating limits? [40 CFR 60.2700]

Pursuant to 40 CFR 60.2700, the Permittee must conduct an initial performance test, as required under 40 CFR 60.8, to determine compliance with the emission limitations in Table 2 of 40 CFR 60, Subpart DDDD and to establish operating limits using the procedure in 40 CFR 60.2675 or 40 CFR 60.2680. The initial performance test must be conducted using the test methods listed in Table 2 of 40 CFR 60, Subpart DDDD and the procedures in 40 CFR 60.2690.

NN.17 By what date must the Permittee conduct the initial performance test? [40 CFR 60.2705]

Pursuant to 40 CFR 60.2705, the initial performance test must be conducted no later than 180 days after the final compliance date. The final compliance date is specified in Table 1 of 40 CFR 60, Subpart DDDD.

NN.18 How does the Permittee demonstrate continuous compliance with the emission limitations and the operating limits? [40 CFR 60.2710]

(a) Pursuant to 40 CFR 60.2710(a), the Permittee must conduct an annual performance test for particulate matter, hydrogen chloride, and opacity for each CISWI unit as required under 40 CFR 60.8 to determine compliance with the emission limitations. The annual performance test must be conducted using the test methods listed in Table 2 of 40 CFR 60, Subpart DDDD and the procedures in 40 CFR 60.2690.

(b) Pursuant to 40 CFR 60.2710(b), the Permittee must continuously monitor the operating parameters specified in 40 CFR 60.2675 or established under 40 CFR 60.2680. Operation above the established maximum or below the established minimum operating limits constitutes a deviation from the established operating limits. Three hour rolling average values are used to determine compliance (except for baghouse leak detection system alarms) unless a different averaging period is established under 40 CFR 60.2680. Operating limits do not apply during performance tests.

(c) Pursuant to 40 CFR 60.2710(c), the Permittee must only burn the same types of waste used to establish operating limits during the performance test.

NN.19 By what date must the Permittee conduct the annual performance test? [40 CFR 60.2715]

Pursuant to 40 CFR 60.2715, the Permittee must conduct annual performance tests for particulate matter, hydrogen chloride, and opacity within 12 months following the initial performance test and conduct subsequent annual performance tests within 12 months following the previous one.

NN.20 May the Permittee conduct performance testing less often? [40 CFR 60.2720]

(a) Pursuant to 40 CFR 60.2720(a), the Permittee can test less often for a given pollutant if the Permittee has test data for at least 3 years, and all performance tests for the pollutant (particulate matter, hydrogen chloride, or opacity) over 3 consecutive years shows compliance with the emission limitation. In this case, the Permittee does not have to conduct a performance test for that pollutant for the next 2 years. The Permittee must conduct a performance test during the third year and no more than 36 months following the previous performance test.

(b) Pursuant to 40 CFR 60.2720(b), if the CISWI unit continues to meet the emission limitation for particulate matter, hydrogen chloride, or opacity, the Permittee may choose to conduct performance tests for these pollutants every third year, but each test must be within 36 months of the previous performance test.

(c) Pursuant to 40 CFR 60.2720(c), if a performance test shows a deviation from an emission limitation for particulate matter, hydrogen chloride, or opacity, the Permittee must conduct annual performance tests for that pollutant until all performance tests over a 3 year period show compliance.

NN.21 May the Permittee conduct a repeat performance test to establish new operating limits? [40 CFR 60.2725]

(a) Pursuant to 40 CFR 60.2725(a), the Permittee may conduct a repeat performance test to establish new operating limits. The Permittee may conduct a repeat performance test at any time to establish new values for the operating limits. IDEM, OAQ may request a repeat performance test at any time.

(b) Pursuant to 40 CFR 60.2725(b), the Permittee must repeat the performance test if the feed stream is different than the feed streams used during any performance test used to demonstrate compliance.

NN.22 What monitoring equipment must the Permittee install and what parameters must the Permittee monitor? [40 CFR 60.2730]

(a) [Reserved]

(b) [Reserved]

(c) Pursuant to 40 CFR 60.2730(c), if the Permittee uses something other than a wet scrubber to comply with the emission limitations under 40 CFR 60.2670, the Permittee must install, calibrate (to the manufacturers' specifications), maintain, and operate the equipment necessary to monitor compliance with the site specific operating limits established using the procedures in 40 CFR 60.2680.

NN.23 Is there a minimum amount of monitoring data the Permittee must obtain? [40 CFR 60.2735]

(a) Pursuant to 40 CFR 60.2735(a), except for monitoring malfunctions, associated repairs, and required quality assurance or quality control activities (including, as applicable, calibration checks and required zero and span adjustments of the monitoring system), the Permittee must conduct all monitoring at all times the CISWI unit is operating.

(b) Pursuant to 40 CFR 60.2735(b), do not use data recorded during monitoring malfunctions, associated repairs, and required quality assurance or quality control activities for meeting the requirements of 40 CFR 60, Subpart DDDD, including data

averages and calculations. The Permittee must use all the data collected during all other periods in assessing compliance with the operating limits.

Recordkeeping and Reporting Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-19]

NN.24 What must the Permittee include in the notifications of achievement of increments of progress? [40 CFR 60.2585]

Pursuant to 40 CFR 60.2585, the notification of achievement of increments of progress must include the three items specified in 40 CFR 60.2585(a) through 40 CFR 60.2585(c).

(a) Notification that the increment of progress has been achieved.

(b) Any items required to be submitted with each increment of progress.

(c) Signature of the owner or operator of the CISWI unit.

NN.25 When must the Permittee submit the notifications of achievement of increments of progress? [40 CFR 60.2590]

Pursuant to 40 CFR 60.2590, notifications for achieving increments of progress must be postmarked no later than 10 business days after the compliance date for the increment.

NN.26 What if the Permittee does not meet an increment of progress? [40 CFR 60.2595]

Pursuant to 40 CFR 60.2595, if the Permittee fails to meet an increment of progress, the Permittee must submit a notification to IDEM, OAQ postmarked within 10 business days after the date for that increment of progress in Table 1 of 40 CFR 60, Subpart DDDD. The Permittee must inform IDEM, OAQ that the increment was not met, and the Permittee must continue to submit reports each subsequent calendar month until the increment of progress is met.

NN.27 How does the Permittee comply with the increment of progress for submittal of a control plan? [40 CFR 60.2600]

Pursuant to 40 CFR 2600, for the control plan increment of progress, the Permittee must satisfy the two requirements specified in 40 CFR 2600(a) and 40 CFR 2600(b).

(a) [Reserved]

(b) Maintain an onsite copy of the final control plan.

NN.28 What site specific documentation is required? [40 CFR 60.2660]

(a) Pursuant to 40 CFR 60.2660(a), documentation must be available at the facility and readily accessible for all CISWI unit operators that addresses the ten topics described in 40 CFR 60.2660(a)(1) through 40 CFR 60.2660(a)(10). The Permittee must maintain this information and the training records required by 40 CFR 60.2660(c) in a manner that they can be readily accessed and are suitable for inspection upon request.

(1) Summary of the applicable standards under 40 CFR 60, Subpart DDDD.

(2) Procedures for receiving, handling, and charging waste.

(3) Incinerator startup, shutdown, and malfunction procedures.

(4) Procedures for maintaining proper combustion air supply levels.

(5) Procedures for operating the incinerator and associated air pollution control systems within the standards established under 40 CFR 60, Subpart DDDD.

(6) Monitoring procedures for demonstrating compliance with the incinerator operating limits.

(7) Reporting and recordkeeping procedures.

(8) The waste management plan required under 40 CFR 60.2620 through 40 CFR 60.2630.

(9) Procedures for handling ash.

(10) A list of the wastes burned during the performance test.

(b) [Applicable under NN.8]

(c) Pursuant to 40 CFR 60.2660(c), the Permittee must also maintain the information specified in 40 CFR 60.2660(c)(1) through 40 CFR 60.2660(c)(3).

(1) Records showing the names of CISWI unit operators who have completed review of the information in 40 CFR 60.2660(a) as required by 40 CFR 60.2660(b), including the date of the initial review and all subsequent annual reviews.

(2) Records showing the names of the CISWI operators who have completed the operator training requirements under 40 CFR 60.2635, met the criteria for qualification under 40 CFR 60.2645, and maintained or renewed their qualification under 40 CFR 60.2650 or 40 CFR 60.2655. Records must include documentation of training, the dates of the initial refresher training, and the dates of their qualification and all subsequent renewals of such qualifications.

(3) For each qualified operator, the phone and/or pager number at which they can be reached during operating hours.

NN.29 What if all the qualified operators are temporarily not accessible? [40 CFR 60.2665]

Pursuant to 40 CFR 60.2665, if all qualified operators are temporarily not accessible (i.e., not at the facility and not able to be at the facility within 1 hour), the Permittee must meet one of the two criteria specified in 40 CFR 60.2665(a) and 40 CFR 60.2665(b), depending on the length of time that a qualified operator is not accessible.

(a) Pursuant to 40 CFR 60.2665(a), when all qualified operators are not accessible for more than 8 hours, but less than 2 weeks, the CISWI unit may be operated by other plant personnel familiar with the operation of the CISWI unit who have completed a review of the information specified in 40 CFR 60.2660(a) within the past 12 months. However, the Permittee must record the period when all qualified operators were not accessible and include this deviation in the annual report as specified under 40 CFR 60.2770.

(b) Pursuant to 40 CFR 60.2665(b), when all qualified operators are not accessible for 2 weeks or more, the Permittee must take the two actions that are described in 40 CFR 60.2665(b)(1) and 40 CFR 60.2665(b)(2).

(1) Notify IDEM, OAQ of this deviation in writing within 10 days. In the notice, the Permittee shall state what caused this deviation, what is being done to ensure that a qualified operator is accessible, and when a qualified operator is anticipated to be accessible.

(2) Submit a status report to IDEM, OAQ every 4 weeks outlining what is being done to ensure that a qualified operator is accessible, stating when a qualified operator is anticipated to be accessible and requesting approval from IDEM, OAQ to continue operation of the CISWI unit. The Permittee must submit the first status report 4 weeks after the notification specified in 40 CFR 60.2665(b)(1). If IDEM, OAQ notifies the Permittee that the request to continue operation of the CISWI unit is disapproved, the CISWI unit may continue operation for 90 days, then

must cease operation. Operation of the unit may resume if the Permittee meets the two requirements in 40 CFR 60.2665(b)(2)(i) and 40 CFR 60.2665(b)(2)(ii).

(i) A qualified operator is accessible as required under 40 CFR 60.2635(a).

(ii) The Permittee notify IDEM, OAQ that a qualified operator is accessible and that the Permittee is resuming operation.

NN.30 What records must the Permittee keep? [40 CFR 60.2740]

Pursuant to 40 CFR 60.2740, the Permittee must maintain the 13 items (as applicable) as specified in 40 CFR 60.2740(a) through 40 CFR 60.2740(m) for a period of at least 5 years:

(a) Calendar date of each record.

(b) Records of the data described in 40 CFR 60.2740(b)(1) through 40 CFR 60.2740(b)(6):

(1) The CISWI unit charge dates, times, weights, and hourly charge rates.

(2) [Reserved]

(3) [Reserved]

(4) [Reserved]

(5) For affected CISWI units that establish operating limits for controls other than wet scrubbers under 40 CFR 60.2680, the Permittee must maintain data collected for all operating parameters used to determine compliance with the operating limits.

(6) [Reserved].

(c) Identification of calendar dates and times for which monitoring systems used to monitor operating limits were inoperative, inactive, malfunctioning, or out of control (except for downtime associated with zero and span and other routine calibration checks). Identify the operating parameters not measured, the duration, reasons for not obtaining the data, and a description of corrective actions taken.

(d) Identification of calendar dates, times, and durations of malfunctions, and a description of the malfunction and the corrective action taken.

(e) Identification of calendar dates and times for which data show a deviation from the operating limits in Table 3 of 40 CFR 60, Subpart DDDD or a deviation from other operating limits established under 40 CFR 60.2680 with a description of the deviations, reasons for such deviations, and a description of corrective actions taken.

(f) The results of the initial, annual, and any subsequent performance tests conducted to determine compliance with the emission limits and/or to establish operating limits, as applicable. Retain a copy of the complete test report including calculations.

(g) Records showing the names of CISWI unit operators who have completed review of the information in 40 CFR 60.2660(a) as required by 40 CFR 60.2660(b), including the date of the initial review and all subsequent annual reviews.

(h) Records showing the names of the CISWI operators who have completed the operator training requirements under 40 CFR 60.2635, met the criteria for qualification under 40 CFR 60.2645, and maintained or renewed their qualification under 40 CFR 60.2650 or 40 CFR 60.2655. Records must include documentation of training, the dates of the initial and refresher training, and the dates of their qualification and all subsequent renewals of such qualifications.

(i) For each qualified operator, the phone and/or pager number at which they can be reached during operating hours.

(j) Records of calibration of any monitoring devices as required under 40 CFR 60.2730.

(k) Equipment vendor specifications and related operation and maintenance requirements for the incinerator, emission controls, and monitoring equipment.

(l) The information listed in 40 CFR 60.2660(a).

(m) On a daily basis, keep a log of the quantity of waste burned and the types of waste burned (always required).

NN.31 Where and in what format must the Permittee keep records? [40 CFR 60.2745]

Pursuant to 40 CFR 60.2745, all records must be available onsite in either paper copy or computer readable format that can be printed upon request, unless an alternative format is approved by IDEM, OAQ.

NN.32 What reports must the Permittee submit? [40 CFR 60.2750]

Pursuant to 40 CFR 60.2750, the Permittee shall submit the reports as specified in Table 5 of 40 CFR 60, Subpart DDDD.

NN.33 What information must the Permittee submit following the initial performance test? [40 CFR 60.2760]

Pursuant to 40 CFR 60.2760, the Permittee must submit the information specified in 40 CFR 60.2760(a) through 40 CFR 60.2760(c) no later than 60 days following the initial performance test. All reports must be signed by the facilities manager.

(a) The complete test report for the initial performance test results obtained under 40 CFR 60.2700, as applicable.

(b) The values for the site specific operating limits established in 40 CFR 60.2675 or 40 CFR 60.2680.

(c) [Reserved]

NN.34 When must the Permittee submit the annual report? [40 CFR 60.2765]

Pursuant to 40 CFR 60.2765, the Permittee must submit an annual report no later than 12 months following the submission of the information in 40 CFR 60.2760. The Permittee must submit subsequent reports no more than 12 months following the previous report. (If the unit is subject to permitting requirements under title V of the Clean Air Act, the Permittee may be required by the permit to submit these reports more frequently.)

NN.35 What information must I include in the annual report? [40 CFR 60.2770]

Pursuant to 40 CFR 60.2770, the annual report required under 40 CFR 60.2765 must include the ten items listed in 40 CFR 60.2770(a) through 40 CFR 60.2770(j). If the Permittee has a deviation from the operating limits or the emission limitations, the Permittee must also submit deviation reports as specified in 40 CFR 60.2775, 40 CFR 60.2780, and 40 CFR 60.2785.

(a) Company name and address.

(b) Statement by a responsible official, with that official's name, title, and signature, certifying the accuracy of the content of the report.

(c) Date of report and beginning and ending dates of the reporting period.

(d) The values for the operating limits established pursuant to 40 CFR 60.2675 or 40 CFR 60.2680.

(e) If no deviation from any emission limitation or operating limit that applies to the Permittee has been reported, a statement that there was no deviation from the emission limitations or operating limits during the reporting period, and that no monitoring system used to determine compliance with the operating limits was inoperative, inactive, malfunctioning or out of control.

(f) The highest recorded 3 hour average and the lowest recorded 3 hour average, as applicable, for each operating parameter recorded for the calendar year being reported.

(g) Information recorded under 40 CFR 60.2740(b)(6) and 40 CFR 60.2740(c) through 40 CFR 60.2740(e) for the calendar year being reported.

(h) If a performance test was conducted during the reporting period, the results of that test.

(i) If the Permittee met the requirements of 40 CFR 60.2720(a) or 40 CFR 60.2720(b), and did not conduct a performance test during the reporting period, the Permittee must state that the requirements of 40 CFR 60.2720(a) or 40 CFR 60.2720(b) were met, and, therefore, not required to conduct a performance test during the reporting period.

(j) Documentation of periods when all qualified CISWI unit operators were unavailable for more than 8 hours, but less than 2 weeks.

NN.36 What else must the Permittee report if the Permittee has a deviation from the operating limits or the emission limitations? [40 CFR 60.2775]

(a) Pursuant to 40 CFR 60.2775(a), the Permittee must submit a deviation report if any recorded 3 hour average parameter level is above the maximum operating limit or below the minimum operating limit established under 40 CFR 60, Subpart DDDD, if the bag leak detection system alarm sounds for more than 5 percent of the operating time for the 6 month reporting period, or if a performance test was conducted that deviated from any emission limitation.

(b) Pursuant to 40 CFR 60.2775(b), the deviation report must be submitted by August 1 of that year for data collected during the first half of the calendar year (January 1 to June 30), and by February 1 of the following year for data collected during the second half of the calendar year (July 1 to December 31).

NN.37 What must the Permittee include in the deviation report? [40 CFR 60.2780]

Pursuant to 40 CFR 60.2780, in each report required under 40 CFR 60.2775, for any pollutant or parameter that deviated from the emission limitations or operating limits specified in 40 CFR 60, Subpart DDDD, include the six items described in 40 CFR 60.2770(a) through 40 CFR 60.2770(f).

(a) The calendar dates and times the unit deviated from the emission limitations or operating limit requirements.

(b) The averaged and recorded data for those dates.

(c) Duration and causes of each deviation from the emission limitations or operating limits and the corrective actions.

(d) A copy of the operating limit monitoring data during each deviation and any test report that documents the emission levels.

(e) The dates, times, number, duration, and causes for monitoring downtime incidents (other than downtime associated with zero, span, and other routine calibration checks).

(f) Whether each deviation occurred during a period of startup, shutdown, or malfunction, or during another period.

NN.38 What else must the Permittee report if the Permittee has a deviation from the requirement to have a qualified operator accessible? [40 CFR 60.2785]

(a) Pursuant to 40 CFR 60.2785(a), if all qualified operators are not accessible for 2 weeks or more, the Permittee must take the two actions in 40 CFR 60.2785(a)(1) and 40 CFR 60.2785(a)(2).

(1) Submit a notification of the deviation within 10 days that includes the three items in 40 CFR 60.2785(a)(1)(i) through 40 CFR 60.2785(a)(1)(iii).

(i) A statement of what caused the deviation.

(ii) A description of what is being done to ensure that a qualified operator is accessible.

(iii) The date when it is anticipated that a qualified operator will be available.

(2) Submit a status report to IDEM, OAQ every 4 weeks that includes the three items in 40 CFR 60.2785(a)(2)(i) through 40 CFR 60.2785(a)(2)(iii).

(i) A description of what is being done to ensure that a qualified operator is accessible.

(ii) The date when it is anticipated that a qualified operator will be accessible.

(iii) Request approval from IDEM, OAQ to continue operation of the CISWI unit.

(b) Pursuant to 40 CFR 60.2785(b), if the unit was shut down by IDEM, OAQ, under the provisions of 40 CFR 60.2665(b)(2), due to a failure to provide an accessible qualified operator, the Permittee must notify IDEM, OAQ that operation is being resumed once a qualified operator is accessible.

NN.39 Are there any other notifications or reports that the Permittee must submit? [40 CFR 60.2790]

Pursuant to 40 CFR 60.2790, the Permittee must submit notifications as provided by 40 CFR 60.7.

NN.40 In what form can the Permittee submit reports? [40 CFR 60.2795]

Pursuant to 40 CFR 60.2795, the Permittee may submit initial, annual, and deviation reports electronically or in paper format, postmarked on or before the submittal due dates.

NN.41 Can reporting dates be changed? [40 CFR 60.2800]

Pursuant to 40 CFR 60.2800, if IDEM, OAQ agrees, the Permittee may change the semiannual or annual reporting dates. See 40 CFR 60.19(c) for procedures to seek approval to change the reporting date.

Subpart PPPP— National Emission Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products

Source: 69 FR 20990, Apr. 19, 2004, unless otherwise noted.

What This Subpart Covers

§ 63.4480 What is the purpose of this subpart?

This subpart establishes national emission standards for hazardous air pollutants (NESHAP) for plastic parts and products surface coating facilities. This subpart also establishes requirements to demonstrate initial and continuous compliance with the emission limitations.

§ 63.4481 Am I subject to this subpart?

(a) Plastic parts and products include, but are not limited to, plastic components of the following types of products as well as the products themselves: Motor vehicle parts and accessories for automobiles, trucks, recreational vehicles; sporting and recreational goods; toys; business machines; laboratory and medical equipment; and household and other consumer products. Except as provided in paragraph (c) of this section, the source category to which this subpart applies is the surface coating of any plastic parts or products, as described in paragraph (a)(1) of this section, and it includes the subcategories listed in paragraphs (a)(2) through (5) of this section.

(1) Surface coating is the application of coating to a substrate using, for example, spray guns or dip tanks. When application of coating to a substrate occurs, then surface coating also includes associated activities, such as surface preparation, cleaning, mixing, and storage. However, these activities do not comprise surface coating if they are not directly related to the application of the coating. Coating application with handheld, non-refillable aerosol containers, touch-up markers, marking pens, or the application of paper film or plastic film which may be pre-coated with an adhesive by the manufacturer are not coating operations for the purposes of this subpart.

(2) The general use coating subcategory includes all surface coating operations that are not automotive lamp coating operations, thermoplastic olefin (TPO) coating operations, or assembled on-road vehicle coating operations.

(3) The automotive lamp coating subcategory includes the surface coating of plastic components of the body of an exterior automotive lamp including, but not limited to, headlamps, tail lamps, turn signals, and marker (clearance) lamps; typical coatings used are reflective argent coatings and clear topcoats. This subcategory does not include the coating of interior automotive lamps, such as dome lamps and instrument panel lamps.

(4) The TPO coating subcategory includes the surface coating of TPO substrates; typical coatings used are adhesion promoters, color coatings, clear coatings and topcoats. The coating of TPO substrates on fully assembled on-road vehicles is not included in the TPO coating subcategory.

(5) The assembled on-road vehicle coating subcategory includes surface coating of fully assembled motor vehicles and trailers intended for on-road use, including, but not limited to: automobiles, light-duty trucks, heavy duty trucks, and busses that have been repaired after a collision or otherwise repainted; fleet delivery trucks; and motor homes and other recreational vehicles (including camping trailers and fifth wheels). This subcategory also includes the incidental coating of parts, such as radiator grilles, that are removed from the fully assembled on-road vehicle to facilitate concurrent coating of all parts associated with the vehicle. The assembled on-road vehicle coating subcategory does not include the surface coating of plastic parts prior to their attachment to an on-road vehicle on an original equipment manufacturer's (OEM) assembly line. The assembled on-road vehicle coating subcategory also does not include the use of adhesives, sealants, and caulks

used in assembling on-road vehicles. Body fillers used to correct small surface defects and rubbing compounds used to remove surface scratches are not considered coatings subject to this subpart.

(b) You are subject to this subpart if you own or operate a new, reconstructed, or existing affected source, as defined in §63.4482, that uses 378 liters (100 gallons (gal)) per year, or more, of coatings that contain hazardous air pollutants (HAP) in the surface coating of plastic parts and products defined in paragraph (a) of this section; and that is a major source, is located at a major source, or is part of a major source of emissions of HAP. A major source of HAP emissions is any stationary source or group of stationary sources located within a contiguous area and under common control that emits or has the potential to emit any single HAP at a rate of 9.07 megagrams (Mg) (10 tons) or more per year or any combination of HAP at a rate of 22.68 Mg (25 tons) or more per year. You do not need to include coatings that meet the definition of non-HAP coating contained in §63.4581 in determining whether you use 378 liters (100 gallons) per year, or more, of coatings in the surface coating of plastic parts and products.

(c) This subpart does not apply to surface coating or a coating operation that meets any of the criteria of paragraphs (c)(1) through (17) of this section.

(1) A coating operation conducted at a facility where the facility uses only coatings, thinners and other additives, and cleaning materials that contain no organic HAP, as determined according to §63.3941(a).

(2) Surface coating operations that occur at research or laboratory facilities, or is part of janitorial, building, and facility maintenance operations, or that occur at hobby shops that are operated for noncommercial purposes.

(3) The surface coating of plastic parts and products performed on-site at installations owned or operated by the Armed Forces of the United States (including the Coast Guard and the National Guard of any such State) or the National Aeronautics and Space Administration, or the surface coating of military munitions manufactured by or for the Armed Forces of the United States (including the Coast Guard and the National Guard of any such State).

(4) Surface coating where plastic is extruded onto plastic parts or products to form a coating.

(5) Surface coating of magnet wire.

(6) In-mold coating operations or gel coating operations in the manufacture of reinforced plastic composite parts that meet the applicability criteria for reinforced plastics composites production (subpart WWWW of this part).

(7) Surface coating of plastic components of wood furniture that meet the applicability criteria for wood furniture manufacturing (subpart JJ of this part).

(8) Surface coating of plastic components of large appliances that meet the applicability criteria for large appliance surface coating (subpart NNNN of this part).

(9) Surface coating of plastic components of metal furniture that meet the applicability criteria for metal furniture surface coating (subpart RRRR of this part).

(10) Surface coating of plastic components of wood building products that meet the applicability criteria for wood building products surface coating (subpart QQQQ of this part).

(11) Surface coating of plastic components of aerospace vehicles that meet the applicability criteria for aerospace manufacturing and rework (40 CFR part 63, subpart GG).

(12) Surface coating of plastic parts intended for use in an aerospace vehicle or component using specialty coatings as defined in appendix A to subpart GG of this part.

(13) Surface coating of plastic components of ships that meet the applicability criteria for shipbuilding and ship repair (subpart II of this part).

(14) Surface coating of plastic using a web coating process that meets the applicability criteria for paper and other web coating (subpart JJJJ of this part).

(15) Surface coating of fiberglass boats or parts of fiberglass boats (including, but not limited to, the use of assembly adhesives) where the facility meets the applicability criteria for boat manufacturing (subpart VVVV of this part), except where the surface coating of the boat is a post-mold coating operation performed on personal watercraft or parts of personal watercraft. This subpart does apply to post-mold coating operations performed on personal watercraft and parts of personal watercraft.

(16) Surface coating of plastic components of automobiles and light-duty trucks that meet the applicability criteria in §63.3082(b) of the Surface Coating of Automobiles and Light-Duty Trucks NESHAP (40 CFR part 63, subpart IIII) at a facility that meets the applicability criteria in §63.3081(b).

(17) Screen printing.

(d) If your facility meets the applicability criteria in §63.3081(b) of the Surface Coating of Automobiles and Light-Duty Trucks NESHAP (40 CFR part 63, subpart IIII) and you perform surface coating of plastic parts or products that meets both the applicability criteria in §63.3082(c) and the applicability criteria of this subpart, then for the surface coating of any or all of your plastic parts or products that meets the applicability criteria in §63.3082(c), you may choose to comply with the requirements of subpart IIII of this part in lieu of complying with this subpart. Surface coating operations on plastic parts or products (e.g., parts for motorcycles or lawnmowers) not intended for use in automobiles, light-duty trucks, or other motor vehicles as defined in §63.3176 cannot be made part of your affected source under subpart IIII of this part.

(e) If you own or operate an affected source that meets the applicability criteria of this subpart and at the same facility you also perform surface coating that meets the applicability criteria of any other final surface coating NESHAP in this part, you may choose to comply as specified in paragraph (e)(1), (2), or (3) of this section.

(1) You may have each surface coating operation that meets the applicability criteria of a separate NESHAP comply with that NESHAP separately.

(2) You may comply with the emission limitation representing the predominant surface coating activity at your facility, as determined according to paragraphs (e)(2)(i) and (ii) of this section. However, you may not establish assembled on-road vehicle or automotive lamp coating operations as the predominant activity. You must not consider any surface coating activity that is subject to the Surface Coating of Automobiles and Light-Duty Trucks NESHAP (40 CFR part 63, subpart IIII) in determining the predominant surface coating activity at your facility.

(i) If a surface coating operation accounts for 90 percent or more of the surface coating activity at your facility (that is, the predominant activity), then compliance with the emission limitations of the predominant activity for all surface coating operations constitutes compliance with these and other applicable surface coating NESHAP. In determining predominant activity, you must include coating activities that meet the applicability criteria of other surface coating NESHAP and constitute more than 1 percent of total coating activities at your facility. Coating activities that meet the applicability criteria of other surface coating NESHAP but comprise less than 1 percent of coating activities need not be included in the determination of predominant activity but must be included in the compliance calculation.

(ii) You must use kilogram (kg) (pound (lb)) of solids used as a measure of relative surface coating activity over a representative period of operation. You may estimate the relative mass of coating solids used from parameters other than coating consumption and mass solids content (*e.g.,* design specifications for the parts or products coated and the number of items produced). The determination of predominant activity must accurately reflect current and projected coating operations and must be verifiable through appropriate documentation. The use of parameters other than coating consumption and mass solids content must be approved by the Administrator. You may use data for any reasonable time period of at least 1 year in determining the relative amount of coating activity, as long as they represent the way the source will continue to operate in the future and are approved by the Administrator. You must determine the predominant activity at your facility and submit the results of that determination with the initial notification required by §63.4510(b). You must also determine predominant activity annually and include the determination in the next semi-annual compliance report required by §63.4520(a).

(3) You may comply with a facility-specific emission limit calculated from the relative amount of coating activity that is subject to each emission limit. If you elect to comply using the facility-specific emission limit alternative, then compliance with the facility-specific emission limit and the emission limitations in this subpart for all surface coating operations constitutes compliance with this subpart and other applicable surface coating NESHAP. The procedures for calculating the facility-specific emission limit are specified in §63.4490. In calculating a facility-specific emission limit, you must include coating activities that meet the applicability criteria of other surface coating NESHAP and constitute more than 1 percent of total coating activities at your facility. You must not consider any surface coating activity that is subject to the Surface Coating of Automobiles and Light-Duty Trucks NESHAP (40 CFR part 63, subpart IIII) in determining a facility-specific emission limit for your facility. Coating activities that meet the applicability criteria of other surface coating NESHAP but comprise less than 1 percent of total coating activities need not be included in the calculation of the facility-specific emission limit but must be included in the compliance calculations.

[69 FR 20990, Apr. 19, 2004, as amended at 69 FR 22660, April 26, 2004; 71 FR 76927, Dec. 22, 2006; 72 FR 20237, Apr. 24, 2007]

§ 63.4482 What parts of my plant does this subpart cover?

(a) This subpart applies to each new, reconstructed, and existing affected source within each of the four subcategories listed in §63.4481(a).

(b) The affected source is the collection of all of the items listed in paragraphs (b)(1) through (4) of this section that are used for surface coating of plastic parts and products within each subcategory.

(1) All coating operations as defined in §63.4581;

(2) All storage containers and mixing vessels in which coatings, thinners and/or other additives, and cleaning materials are stored or mixed;

(3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and

(4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation.

(c) An affected source is a new source if it meets the criteria in paragraph (c)(1) of this section and the criteria in either paragraph (c)(2) or (3) of this section.

(1) You commenced the construction of the source after December 4, 2002 by installing new coating equipment.

(2) The new coating equipment is used to coat plastic parts and products at a source where no plastic parts surface coating was previously performed.

(3) The new coating equipment is used to perform plastic parts and products coating in a subcategory that was not previously performed.

(d) An affected source is reconstructed if you meet the criteria as defined in §63.2.

(e) An affected source is existing if it is not new or reconstructed.

§ 63.4483 When do I have to comply with this subpart?

The date by which you must comply with this subpart is called the compliance date. The compliance date for each type of affected source is specified in paragraphs (a) through (c) of this section. The compliance date begins the initial compliance period during which you conduct the initial compliance demonstration described in §§63.4540, 63.4550, and 63.4560.

(a) For a new or reconstructed affected source, the compliance date is the applicable date in paragraph (a)(1) or (2) of this section:

(1) If the initial startup of your new or reconstructed affected source is before April 19, 2004, the compliance date is April 19, 2004.

(2) If the initial startup of your new or reconstructed affected source occurs after April 19, 2004, the compliance date is the date of initial startup of your affected source.

(b) For an existing affected source, the compliance date is the date 3 years after April 19, 2004.

(c) For an area source that increases its emissions or its potential to emit such that it becomes a major source of HAP emissions, the compliance date is specified in paragraphs (c)(1) and (2) of this section.

(1) For any portion of the source that becomes a new or reconstructed affected source subject to this subpart, the compliance date is the date of initial startup of the affected source or April 19, 2004, whichever is later.

(2) For any portion of the source that becomes an existing affected source subject to this subpart, the compliance date is the date 1 year after the area source becomes a major source or 3 years after April 19, 2004, whichever is later.

(d) You must meet the notification requirements in §63.4510 according to the dates specified in that section and in subpart A of this part. Some of the notifications must be submitted before the compliance dates described in paragraphs (a) through (c) of this section.

Emission Limitations

§ 63.4490 What emission limits must I meet?

(a) For a new or reconstructed affected source, you must limit organic HAP emissions to the atmosphere from the affected source to the applicable limit specified in paragraphs (a)(1) through (4) of this section, except as specified in paragraph (c) of this section, determined according to the requirements in §63.4541, §63.4551, or §63.4561.

(1) For each new general use coating affected source, limit organic HAP emissions to no more than 0.16 kg (0.16 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(2) For each new automotive lamp coating affected source, limit organic HAP emissions to no more than 0.26 kg (0.26 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(3) For each new TPO coating affected source, limit organic HAP emissions to no more than 0.22 kg (0.22 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(4) For each new assembled on-road vehicle coating affected source, limit organic HAP emissions to no more than 1.34 kg (1.34 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(b) For an existing affected source, you must limit organic HAP emissions to the atmosphere from the affected source to the applicable limit specified in paragraphs (b)(1) through (4) of this section, except as specified in paragraph (c) of this section, determined according to the requirements in §63.4541, §63.4551, or §63.4561.

(1) For each existing general use coating affected source, limit organic HAP emissions to no more than 0.16 kg (0.16 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(2) For each existing automotive lamp coating affected source, limit organic HAP emissions to no more than 0.45 kg (0.45 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(3) For each existing TPO coating affected source, limit organic HAP emissions to no more than 0.26 kg (0.26 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(4) For each existing assembled on-road vehicle coating affected source, limit organic HAP emissions to no more than 1.34 kg (1.34 lb) organic HAP emitted per kg (lb) coating solids used during each 12-month compliance period.

(c) If your facility's surface coating operations meet the applicability criteria of more than one of the subcategory emission limits specified in paragraphs (a) or (b) of this section, you may comply separately with each subcategory emission limit or comply using one of the alternatives in paragraph (c)(1) or (2) of this section.

(1) If the general use or TPO surface coating operations subject to only one of the emission limits specified in paragraphs (a)(1), (a)(3), (b)(1), or (b)(3) of this section account for 90 percent or more of the surface coating activity at your facility (*i.e.,* it is the predominant activity at your facility), then compliance with that emission limitation for all surface coating operations constitutes compliance with the other applicable emission limitations. You must use kg (lb) of solids used as a measure of relative surface coating activity over a representative period of operation. You may estimate the relative mass of coating solids used from parameters other than coating consumption and mass solids content (*e.g.,* design specifications for the parts or products coated and the number of items produced). The determination of predominant activity must accurately reflect current and projected coating operations and must be verifiable through appropriate documentation. The use of parameters other than coating consumption and mass solids content must be approved by the Administrator. You may use data for any reasonable time period of at least 1 year in determining the relative amount of coating activity, as long as they represent the way the source will continue to operate in the future and are approved by the Administrator. You must determine the predominant activity at your facility and submit the results of that determination with the initial notification required by §63.4510(b). Additionally, you must determine the facility's predominant activity annually and include the determination in the next semi-annual compliance report required by §63.4520(a).

(2) You may calculate and comply with a facility-specific emission limit as described in paragraphs (c)(2)(i) through (iii) of this section. If you elect to comply using the facility-specific emission limit alternative, then compliance with the facility-specific emission limit and the emission limitations in this subpart for all surface coating operations constitutes compliance with this and other applicable surface coating NESHAP. In calculating a facility-specific emission limit, you must include coating activities that meet the applicability criteria of the other subcategories and constitute more than 1 percent of total coating activities. Coating activities that meet the applicability criteria of other surface coating NESHAP but comprise less than 1 percent of coating activities need not be included in the determination of predominant activity but must be included in the compliance calculation.

(i) You are required to calculate the facility-specific emission limit for your facility when you submit the notification of compliance status required in §63.4510(c), and on a monthly basis afterward using the coating data for the relevant 12-month compliance period.

(ii) Use Equation 1 of this section to calculate the facility-specific emission limit for your surface coating operations for each 12-month compliance period.

$$Facility-Specific\ \text{Emission Limit} = \frac{\sum_{i=1}^{n}(\text{Limit}_i)(Solids_i)}{\sum_{i=1}^{n}(Solids_i)} \qquad (Eq.\ 1)$$

Where:

Facility-specific emission limit = Facility-specific emission limit for each 12-month compliance period, kg (lb) organic HAP per kg (lb) coating solids used.

Limit_i= The new source or existing source emission limit applicable to coating operation, i, included in the facility-specific emission limit, converted to kg (lb) organic HAP per kg (lb) coating solids used, if the emission limit is not already in those units. All emission limits included in the facility-specific emission limit must be in the same units.

Solids_i= The kg (lb) of solids used in coating operation, i, in the 12-month compliance period that is subject to emission limit, i. You may estimate the mass of coating solids used from parameters other than coating consumption and mass solids content (*e.g.,* design specifications for the parts or products coated and the number of items produced). The use of parameters other than coating consumption and mass solids content must be approved by the Administrator.

n = The number of different coating operations included in the facility-specific emission limit.

(iii) If you need to convert an emission limit in another surface coating NESHAP from kg (lb) organic HAP per liter (gallon) coating solids used to kg (lb) organic HAP per kg (lb) coating solids used, you must use the default solids density of 1.50 kg solids per liter coating solids (12.5 lb solids per gal solids).

§ 63.4491 What are my options for meeting the emission limits?

You must include all coatings (as defined in §63.4581), thinners and/or other additives, and cleaning materials used in the affected source when determining whether the organic HAP emission rate is equal to or less than the applicable emission limit in §63.4490. To make this determination, you must use at least one of the three compliance options listed in paragraphs (a) through (c) of this section. You may

apply any of the compliance options to an individual coating operation, or to multiple coating operations as a group, or to the entire affected source. You may use different compliance options for different coating operations, or at different times on the same coating operation. You may employ different compliance options when different coatings are applied to the same part, or when the same coating is applied to different parts. However, you may not use different compliance options at the same time on the same coating operation. If you switch between compliance options for any coating operation or group of coating operations, you must document this switch as required by §63.4530(c), and you must report it in the next semiannual compliance report required in §63.4520.

(a) *Compliant material option.* Demonstrate that the organic HAP content of each coating used in the coating operation(s) is less than or equal to the applicable emission limit in §63.4490, and that each thinner and/or other additive, and cleaning material used contains no organic HAP. You must meet all the requirements of §§63.4540, 63.4541, and 63.4542 to demonstrate compliance with the applicable emission limit using this option.

(b) *Emission rate without add-on controls option.* Demonstrate that, based on the coatings, thinners and/or other additives, and cleaning materials used in the coating operation(s), the organic HAP emission rate for the coating operation(s) is less than or equal to the applicable emission limit in §63.4490, calculated as a rolling 12-month emission rate and determined on a monthly basis. You must meet all the requirements of §§63.4550, 63.4551, and 63.4552 to demonstrate compliance with the emission limit using this option.

(c) *Emission rate with add-on controls option.* Demonstrate that, based on the coatings, thinners and/or other additives, and cleaning materials used in the coating operation(s), and the emissions reductions achieved by emission capture systems and add-on controls, the organic HAP emission rate for the coating operation(s) is less than or equal to the applicable emission limit in §63.4490, calculated as a rolling 12-month emission rate and determined on a monthly basis. If you use this compliance option, you must also demonstrate that all emission capture systems and add-on control devices for the coating operation(s) meet the operating limits required in §63.4492, except for solvent recovery systems for which you conduct liquid-liquid material balances according to §63.4561(j), and that you meet the work practice standards required in §63.4493. You must meet all the requirements of §§63.4560 through 63.4568 to demonstrate compliance with the emission limits, operating limits, and work practice standards using this option.

§ 63.4492 What operating limits must I meet?

(a) For any coating operation(s) on which you use the compliant material option or the emission rate without add-on controls option, you are not required to meet any operating limits.

(b) For any controlled coating operation(s) on which you use the emission rate with add-on controls option, except those for which you use a solvent recovery system and conduct a liquid-liquid material balance according to §63.4561(j), you must meet the operating limits specified in Table 1 to this subpart. These operating limits apply to the emission capture and control systems on the coating operation(s) for which you use this option, and you must establish the operating limits during the performance test according to the requirements in §63.4567. You must meet the operating limits at all times after you establish them.

(c) If you use an add-on control device other than those listed in Table 1 to this subpart, or wish to monitor an alternative parameter and comply with a different operating limit, you must apply to the Administrator for approval of alternative monitoring under §63.8(f).

§ 63.4493 What work practice standards must I meet?

(a) For any coating operation(s) on which you use the compliant material option or the emission rate without add-on controls option, you are not required to meet any work practice standards.

(b) If you use the emission rate with add-on controls option, you must develop and implement a work practice plan to minimize organic HAP emissions from the storage, mixing, and conveying of coatings, thinners and/or other additives, and cleaning materials used in, and waste materials generated by the controlled coating operation(s) for which you use this option; or you must meet an alternative standard as provided in paragraph (c) of this section. The plan must specify practices and procedures to ensure that, at a minimum, the elements specified in paragraphs (b)(1) through (5) of this section are implemented.

(1) All organic-HAP-containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be stored in closed containers.

(2) Spills of organic-HAP-containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be minimized.

(3) Organic-HAP-containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be conveyed from one location to another in closed containers or pipes.

(4) Mixing vessels which contain organic-HAP-containing coatings and other materials must be closed except when adding to, removing, or mixing the contents.

(5) Emissions of organic HAP must be minimized during cleaning of storage, mixing, and conveying equipment.

(c) As provided in §63.6(g), we, the U.S. Environmental Protection Agency, may choose to grant you permission to use an alternative to the work practice standards in this section.

General Compliance Requirements

§ 63.4500 What are my general requirements for complying with this subpart?

(a) You must be in compliance with the emission limitations in this subpart as specified in paragraphs (a)(1) and (2) of this section.

(1) Any coating operation(s) for which you use the compliant material option or the emission rate without add-on controls option, as specified in §63.4491(a) and (b), must be in compliance with the applicable emission limit in §63.4490 at all times.

(2) Any coating operation(s) for which you use the emission rate with add-on controls option, as specified in §63.4491(c), must be in compliance with the emission limitations as specified in paragraphs (a)(2)(i) through (iii) of this section.

(i) The coating operation(s) must be in compliance with the applicable emission limit in §63.4490 at all times except during periods of startup, shutdown, and malfunction.

(ii) The coating operation(s) must be in compliance with the operating limits for emission capture systems and add-on control devices required by §63.4492 at all times except during periods of startup, shutdown, and malfunction, and except for solvent recovery systems for which you conduct liquid-liquid material balances according to §63.4561(j).

(iii) The coating operation(s) must be in compliance with the work practice standards in §63.4493 at all times.

(b) You must always operate and maintain your affected source, including all air pollution control and monitoring equipment you use for purposes of complying with this subpart, according to the provisions in §63.6(e)(1)(i).

(c) If your affected source uses an emission capture system and add-on control device, you must develop a written startup, shutdown, and malfunction plan according to the provisions in §63.6(e)(3). The plan must address the startup, shutdown, and corrective actions in the event of a malfunction of the emission capture system or the add-on control device. The plan must also address any coating operation equipment that may cause increased emissions or that would affect capture efficiency if the process equipment malfunctions, such as conveyors that move parts among enclosures.

[69 FR 20990, Apr. 19, 2004, as amended at 71 FR 20465, Apr. 20, 2006]

§ 63.4501 What parts of the General Provisions apply to me?

Table 2 to this subpart shows which parts of the General Provisions in §§63.1 through 63.15 apply to you.

Notifications, Reports, and Records

§ 63.4510 What notifications must I submit?

(a) *General.* You must submit the notifications in §§63.7(b) and (c), 63.8(f)(4), and 63.9(b) through (e) and (h) that apply to you by the dates specified in those sections, except as provided in paragraphs (b) and (c) of this section.

(b) *Initial notification.* You must submit the initial notification required by §63.9(b) for a new or reconstructed affected source no later than 120 days after initial startup or 120 days after April 19, 2004, whichever is later. For an existing affected source, you must submit the initial notification no later than 1 year after April 19, 2004. If you are using compliance with the Surface Coating of Automobiles and Light-Duty Trucks NESHAP (subpart IIII of this part) as provided for under §63.4481(d) to constitute compliance with this subpart for any or all of your plastic parts coating operations, then you must include a statement to this effect in your initial notification, and no other notifications are required under this subpart in regard to those plastic parts coating operations. If you are complying with another NESHAP that constitutes the predominant activity at your facility under §63.4481(e)(2) to constitute compliance with this subpart for your plastic parts coating operations, then you must include a statement to this effect in your initial notification, and no other notifications are required under this subpart in regard to those plastic parts coating operations.

(c) *Notification of compliance status.* You must submit the notification of compliance status required by §63.9(h) no later than 30 calendar days following the end of the initial compliance period described in §63.4540, §63.4550, or §63.4560 that applies to your affected source. The notification of compliance status must contain the information specified in paragraphs (c)(1) through (11) of this section and in §63.9(h).

(1) Company name and address.

(2) Statement by a responsible official with that official's name, title, and signature, certifying the truth, accuracy, and completeness of the content of the report.

(3) Date of the report and beginning and ending dates of the reporting period. The reporting period is the initial compliance period described in §63.4540, §63.4550, or §63.4560 that applies to your affected source.

(4) Identification of the compliance option or options specified in §63.4491 that you used on

each coating operation in the affected source during the initial compliance period.

(5) Statement of whether or not the affected source achieved the emission limitations for the initial compliance period.

(6) If you had a deviation, include the information in paragraphs (c)(6)(i) and (ii) of this section.

(i) A description and statement of the cause of the deviation.

(ii) If you failed to meet the applicable emission limit in §63.4490, include all the calculations you used to determine the kg (lb) organic HAP emitted per kg (lb) coating solids used. You do not need to submit information provided by the materials' suppliers or manufacturers, or test reports.

(7) For each of the data items listed in paragraphs (c)(7)(i) through (iv) of this section that is required by the compliance option(s) you used to demonstrate compliance with the emission limit, include an example of how you determined the value, including calculations and supporting data. Supporting data may include a copy of the information provided by the supplier or manufacturer of the example coating or material, or a summary of the results of testing conducted according to §63.4541(a), (b), or (c). You do not need to submit copies of any test reports.

(i) Mass fraction of organic HAP for one coating, for one thinner and/or other additive, and for one cleaning material.

(ii) Mass fraction of coating solids for one coating.

(iii) Density for one coating, one thinner and/or other additive, and one cleaning material, except that if you use the compliant material option, only the example coating density is required.

(iv) The amount of waste materials and the mass of organic HAP contained in the waste materials for which you are claiming an allowance in Equation 1 of §63.4551.

(8) The calculation of kg (lb) organic HAP emitted per kg (lb) coating solids used for the compliance option(s) you used, as specified in paragraphs (c)(8)(i) through (iii) of this section.

(i) For the compliant material option, provide an example calculation of the organic HAP content for one coating, using Equation 1 of §63.4541.

(ii) For the emission rate without add-on controls option, provide the calculation of the total mass of organic HAP emissions for each month; the calculation of the total mass of coating solids used each month; and the calculation of the 12-month organic HAP emission rate using Equations 1 and 1A through 1C, 2, and 3, respectively, of §63.4551.

(iii) For the emission rate with add-on controls option, provide the calculation of the total mass of organic HAP emissions for the coatings, thinners and/or other additives, and cleaning materials used each month, using Equations 1 and 1A through 1C of §63.4551; the calculation of the total mass of coating solids used each month using Equation 2 of §63.4551; the mass of organic HAP emission reduction each month by emission capture systems and add-on control devices using Equations 1 and 1A through 1D of §63.4561 and Equations 2, 3, and 3A through 3C of §63.4561, as applicable; the calculation of the total mass of organic HAP emissions each month using Equation 4 of §63.4561; and the calculation of the 12-month organic HAP emission rate using Equation 5 of

§63.4561.

(9) For the emission rate with add-on controls option, you must include the information specified in paragraphs (c)(9)(i) through (iv) of this section, except that the requirements in paragraphs (c)(9)(i) through (iii) of this section do not apply to solvent recovery systems for which you conduct liquid-liquid material balances according to §63.4561(j).

(i) For each emission capture system, a summary of the data and copies of the calculations supporting the determination that the emission capture system is a permanent total enclosure (PTE) or a measurement of the emission capture system efficiency. Include a description of the protocol followed for measuring capture efficiency, summaries of any capture efficiency tests conducted, and any calculations supporting the capture efficiency determination. If you use the data quality objective (DQO) or lower confidence limit (LCL) approach, you must also include the statistical calculations to show you meet the DQO or LCL criteria in appendix A to subpart KK of this part. You do not need to submit complete test reports.

(ii) A summary of the results of each add-on control device performance test. You do not need to submit complete test reports.

(iii) A list of each emission capture system's and add-on control device's operating limits and a summary of the data used to calculate those limits.

(iv) A statement of whether or not you developed and implemented the work practice plan required by §63.4493.

(10) If you are complying with a single emission limit representing the predominant activity under §63.4490(c)(1), include the calculations and supporting information used to demonstrate that this emission limit represents the predominant activity as specified in §63.4490(c)(1).

(11) If you are complying with a facility-specific emission limit under §63.4490(c)(2), include the calculation of the facility-specific emission limit and any supporting information as specified in §63.4490(c)(2).

[69 FR 20990, Apr. 19, 2004, as amended at 69 FR 22661, Apr. 26, 2004]

§ 63.4520 What reports must I submit?

(a) *Semiannual compliance reports.* You must submit semiannual compliance reports for each affected source according to the requirements of paragraphs (a)(1) through (7) of this section. The semiannual compliance reporting requirements may be satisfied by reports required under other parts of the Clean Air Act (CAA), as specified in paragraph (a)(2) of this section.

(1) *Dates.* Unless the Administrator has approved or agreed to a different schedule for submission of reports under §63.10(a), you must prepare and submit each semiannual compliance report according to the dates specified in paragraphs (a)(1)(i) through (iv) of this section. Note that the information reported for each of the months in the reporting period will be based on the last 12 months of data prior to the date of each monthly calculation.

(i) The first semiannual compliance report must cover the first semiannual reporting period which begins the day after the end of the initial compliance period described in §63.4540, §63.4550, or §63.4560 that applies to your affected source and ends on June 30 or December 31, whichever date is the first date following the end of the initial compliance period.

(ii) Each subsequent semiannual compliance report must cover the subsequent

semiannual reporting period from January 1 through June 30 or the semiannual reporting period from July 1 through December 31.

(iii) Each semiannual compliance report must be postmarked or delivered no later than July 31 or January 31, whichever date is the first date following the end of the semiannual reporting period.

(iv) For each affected source that is subject to permitting regulations pursuant to 40 CFR part 70 or 40 CFR part 71, and if the permitting authority has established dates for submitting semiannual reports pursuant to 40 CFR 70.6(a)(3)(iii)(A) or 40 CFR 71.6(a)(3)(iii)(A), you may submit the first and subsequent compliance reports according to the dates the permitting authority has established instead of according to the date specified in paragraph (a)(1)(iii) of this section.

(2) *Inclusion with title V report.* Each affected source that has obtained a title V operating permit pursuant to 40 CFR part 70 or 40 CFR part 71 must report all deviations as defined in this subpart in the semiannual monitoring report required by 40 CFR 70.6(a)(3)(iii)(A) or 40 CFR 71.6(a)(3)(iii)(A). If an affected source submits a semiannual compliance report pursuant to this section along with, or as part of, the semiannual monitoring report required by 40 CFR 70.6(a)(3)(iii)(A) or 40 CFR 71.6(a)(3)(iii)(A), and the semiannual compliance report includes all required information concerning deviations from any emission limitation in this subpart, its submission will be deemed to satisfy any obligation to report the same deviations in the semiannual monitoring report. However, submission of a semiannual compliance report shall not otherwise affect any obligation the affected source may have to report deviations from permit requirements to the permitting authority.

(3) *General requirements.* The semiannual compliance report must contain the information specified in paragraphs (a)(3)(i) through (vii) of this section, and the information specified in paragraphs (a)(4) through (7) and (c)(1) of this section that is applicable to your affected source.

(i) Company name and address.

(ii) Statement by a responsible official with that official's name, title, and signature, certifying the truth, accuracy, and completeness of the content of the report.

(iii) Date of report and beginning and ending dates of the reporting period. The reporting period is the 6-month period ending on June 30 or December 31. Note that the information reported for each of the 6 months in the reporting period will be based on the last 12 months of data prior to the date of each monthly calculation.

(iv) Identification of the compliance option or options specified in §63.4491 that you used on each coating operation during the reporting period. If you switched between compliance options during the reporting period, you must report the beginning and ending dates for each option you used.

(v) If you used the emission rate without add-on controls or the emission rate with add-on controls compliance option (§63.4491(b) or (c)), the calculation results for each rolling 12-month organic HAP emission rate during the 6-month reporting period.

(vi) If you used the predominant activity alternative (§63.4490(c)(1)), include the annual determination of predominant activity if it was not included in the previous semi-annual compliance report.

(vii) If you used the facility-specific emission limit alternative (§63.4490(c)(2)), include the calculation of the facility-specific emission limit for each 12-month compliance period during the 6-month reporting period.

(4) *No deviations.* If there were no deviations from the emission limitations in §§63.4490, 63.4492, and 63.4493 that apply to you, the semiannual compliance report must include a statement that there were no deviations from the emission limitations during the reporting period. If you used the emission rate with add-on controls option and there were no periods during which the continuous parameter monitoring systems (CPMS) were out-of-control as specified in §63.8(c)(7), the semiannual compliance report must include a statement that there were no periods during which the CPMS were out-of-control during the reporting period.

(5) *Deviations: Compliant material option.* If you used the compliant material option and there was a deviation from the applicable organic HAP content requirements in §63.4490, the semiannual compliance report must contain the information in paragraphs (a)(5)(i) through (iv) of this section.

(i) Identification of each coating used that deviated from the applicable emission limit, and each thinner and/or other additive, and cleaning material used that contained organic HAP, and the dates and time periods each was used.

(ii) The calculation of the organic HAP content (using Equation 1 of §63.4541) for each coating identified in paragraph (a)(5)(i) of this section. You do not need to submit background data supporting this calculation (*e.g.,* information provided by coating suppliers or manufacturers, or test reports).

(iii) The determination of mass fraction of organic HAP for each thinner and/or other additive, and cleaning material identified in paragraph (a)(5)(i) of this section. You do not need to submit background data supporting this calculation (*e.g.,* information provided by material suppliers or manufacturers, or test reports).

(iv) A statement of the cause of each deviation.

(6) *Deviations: Emission rate without add-on controls option.* If you used the emission rate without add-on controls option and there was a deviation from the applicable emission limit in §63.4490, the semiannual compliance report must contain the information in paragraphs (a)(6)(i) through (iii) of this section.

(i) The beginning and ending dates of each compliance period during which the 12-month organic HAP emission rate exceeded the applicable emission limit in §63.4490.

(ii) The calculations used to determine the 12-month organic HAP emission rate for the compliance period in which the deviation occurred. You must submit the calculations for Equations 1, 1A through 1C, 2, and 3 of §63.4551; and if applicable, the calculation used to determine mass of organic HAP in waste materials according to §63.4551(e)(4). You do not need to submit background data supporting these calculations (*e.g.,* information provided by materials suppliers or manufacturers, or test reports).

(iii) A statement of the cause of each deviation.

(7) *Deviations: Emission rate with add-on controls option.* If you used the emission rate with add-on controls option and there was a deviation from an emission limitation (including any periods when emissions bypassed the add-on control device and were diverted to the atmosphere), the semiannual compliance report must contain the information in paragraphs (a)(7)(i) through (xiv) of this section. This includes periods of startup, shutdown, and malfunction during which deviations occurred.

(i) The beginning and ending dates of each compliance period during which the 12-month organic HAP emission rate exceeded the applicable emission limit in §63.4490.

(ii) The calculations used to determine the 12-month organic HAP emission rate for each compliance period in which a deviation occurred. You must provide the calculation of the total mass of organic HAP emissions for the coatings, thinners and/or other additives, and cleaning materials used each month using Equations 1 and 1A through 1C of §63.4551; and, if applicable, the calculation used to determine mass of organic HAP in waste materials according to §63.4551(e)(4); the calculation of the total mass of coating solids used each month using Equation 2 of §63.4551; the calculation of the mass of organic HAP emission reduction each month by emission capture systems and add-on control devices using Equations 1 and 1A through 1D of §63.4561, and Equations 2, 3, and 3A through 3C of §63.4561, as applicable; the calculation of the total mass of organic HAP emissions each month using Equation 4 of §63.4561; and the calculation of the 12-month organic HAP emission rate using Equation 5 of §63.4561. You do not need to submit the background data supporting these calculations (*e.g.,* information provided by materials suppliers or manufacturers, or test reports).

(iii) The date and time that each malfunction started and stopped.

(iv) A brief description of the CPMS.

(v) The date of the latest CPMS certification or audit.

(vi) The date and time that each CPMS was inoperative, except for zero (low-level) and high-level checks.

(vii) The date, time, and duration that each CPMS was out-of-control, including the information in §63.8(c)(8).

(viii) The date and time period of each deviation from an operating limit in Table 1 to this subpart; date and time period of any bypass of the add-on control device; and whether each deviation occurred during a period of startup, shutdown, or malfunction or during another period.

(ix) A summary of the total duration of each deviation from an operating limit in Table 1 to this subpart and each bypass of the add-on control device during the semiannual reporting period, and the total duration as a percent of the total source operating time during that semiannual reporting period.

(x) A breakdown of the total duration of the deviations from the operating limits in Table 1 of this subpart and bypasses of the add-on control device during the semiannual reporting period into those that were due to startup, shutdown, control equipment problems, process problems, other known causes, and other unknown causes.

(xi) A summary of the total duration of CPMS downtime during the semiannual reporting period and the total duration of CPMS downtime as a percent of the total source operating time during that semiannual reporting period.

(xii) A description of any changes in the CPMS, coating operation, emission capture system, or add-on control device since the last semiannual reporting period.

(xiii) For each deviation from the work practice standards, a description of the deviation, the date and time period of the deviation, and the actions you took to correct the deviation.

(xiv) A statement of the cause of each deviation.

(b) *Performance test reports.* If you use the emission rate with add-on controls option, you must submit reports of performance test results for emission capture systems and add-on control devices no later than 60 days after completing the tests as specified in §63.10(d)(2).

(c) *Startup, shutdown, malfunction reports.* If you used the emission rate with add-on controls option and you had a startup, shutdown, or malfunction during the semiannual reporting period, you must submit the reports specified in paragraphs (c)(1) and (2) of this section.

(1) If your actions were consistent with your startup, shutdown, and malfunction plan, you must include the information specified in §63.10(d) in the semiannual compliance report required by paragraph (a) of this section.

(2) If your actions were not consistent with your startup, shutdown, and malfunction plan, you must submit an immediate startup, shutdown, and malfunction report as described in paragraphs (c)(2)(i) and (ii) of this section.

(i) You must describe the actions taken during the event in a report delivered by facsimile, telephone, or other means to the Administrator within 2 working days after starting actions that are inconsistent with the plan.

(ii) You must submit a letter to the Administrator within 7 working days after the end of the event, unless you have made alternative arrangements with the Administrator as specified in §63.10(d)(5)(ii). The letter must contain the information specified in §63.10(d)(5)(ii).

§ 63.4530 What records must I keep?

You must collect and keep records of the data and information specified in this section. Failure to collect and keep these records is a deviation from the applicable standard.

(a) A copy of each notification and report that you submitted to comply with this subpart, and the documentation supporting each notification and report. If you are using the predominant activity alternative under §63.4490(c), you must keep records of the data and calculations used to determine the predominant activity. If you are using the facility-specific emission limit alternative under §63.4490(c), you must keep records of the data used to calculate the facility-specific emission limit for the initial compliance demonstration. You must also keep records of any data used in each annual predominant activity determination and in the calculation of the facility-specific emission limit for each 12-month compliance period included in the semi-annual compliance reports.

(b) A current copy of information provided by materials suppliers or manufacturers, such as manufacturer's formulation data, or test data used to determine the mass fraction of organic HAP and density for each coating, thinner and/or other additive, and cleaning material, and the mass fraction of coating solids for each coating. If you conducted testing to determine mass fraction of organic HAP, density, or mass fraction of coating solids, you must keep a copy of the complete test report. If you use information provided to you by the manufacturer or supplier of the material

that was based on testing, you must keep the summary sheet of results provided to you by the manufacturer or supplier. You are not required to obtain the test report or other supporting documentation from the manufacturer or supplier.

(c) For each compliance period, the records specified in paragraphs (c)(1) through (4) of this section.

(1) A record of the coating operations on which you used each compliance option and the time periods (beginning and ending dates and times) for each option you used.

(2) For the compliant material option, a record of the calculation of the organic HAP content for each coating, using Equation 1 of §63.4541.

(3) For the emission rate without add-on controls option, a record of the calculation of the total mass of organic HAP emissions for the coatings, thinners and/or other additives, and cleaning materials used each month using Equations 1, 1A through 1C, and 2 of §63.4551 and, if applicable, the calculation used to determine mass of organic HAP in waste materials according to §63.4551(e)(4); the calculation of the total mass of coating solids used each month using Equation 2 of §63.4551; and the calculation of each 12-month organic HAP emission rate using Equation 3 of §63.4551.

(4) For the emission rate with add-on controls option, records of the calculations specified in paragraphs (c)(4)(i) through (v) of this section.

(i) The calculation of the total mass of organic HAP emissions for the coatings, thinners and/or other additives, and cleaning materials used each month using Equations 1 and 1A through 1C of §63.4551; and, if applicable, the calculation used to determine mass of organic HAP in waste materials according to §63.4551(e)(4);

(ii) The calculation of the total mass of coating solids used each month using Equation 2 of §63.4551;

(iii) The calculation of the mass of organic HAP emission reduction by emission capture systems and add-on control devices using Equations 1 and 1A through 1D of §63.4561 and Equations 2, 3, and 3A through 3C of §63.4561, as applicable;

(iv) The calculation of each month's organic HAP emission rate using Equation 4 of §63.4561; and

(v) The calculation of each 12-month organic HAP emission rate using Equation 5 of §63.4561.

(d) A record of the name and mass of each coating, thinner and/or other additive, and cleaning material used during each compliance period. If you are using the compliant material option for all coatings at the source, you may maintain purchase records for each material used rather than a record of the mass used.

(e) A record of the mass fraction of organic HAP for each coating, thinner and/or other additive, and cleaning material used during each compliance period.

(f) A record of the mass fraction of coating solids for each coating used during each compliance period.

(g) If you use an allowance in Equation 1 of §63.4551 for organic HAP contained in waste materials sent to or designated for shipment to a treatment, storage, and disposal facility (TSDF) according to §63.4551(e)(4), you must keep records of the information specified in paragraphs (g)(1) through (3) of this section.

(1) The name and address of each TSDF to which you sent waste materials for which you use an allowance in Equation 1 of §63.4551, a statement of which subparts under 40 CFR parts 262, 264, 265, and 266 apply to the facility; and the date of each shipment.

(2) Identification of the coating operations producing waste materials included in each shipment and the month or months in which you used the allowance for these materials in Equation 1 of §63.4551.

(3) The methodology used in accordance with §63.4551(e)(4) to determine the total amount of waste materials sent to or the amount collected, stored, and designated for transport to a TSDF each month; and the methodology to determine the mass of organic HAP contained in these waste materials. This must include the sources for all data used in the determination, methods used to generate the data, frequency of testing or monitoring, and supporting calculations and documentation, including the waste manifest for each shipment.

(h) You must keep records of the date, time, and duration of each deviation.

(i) If you use the emission rate with add-on controls option, you must keep the records specified in paragraphs (i)(1) through (8) of this section.

(1) For each deviation, a record of whether the deviation occurred during a period of startup, shutdown, or malfunction.

(2) The records in §63.6(e)(3)(iii) through (v) related to startup, shutdown, and malfunction.

(3) The records required to show continuous compliance with each operating limit specified in Table 1 to this subpart that applies to you.

(4) For each capture system that is a PTE, the data and documentation you used to support a determination that the capture system meets the criteria in Method 204 of appendix M to 40 CFR part 51 for a PTE and has a capture efficiency of 100 percent, as specified in §63.4565(a).

(5) For each capture system that is not a PTE, the data and documentation you used to determine capture efficiency according to the requirements specified in §§63.4564 and 63.4565(b) through (e), including the records specified in paragraphs (i)(5)(i) through (iii) of this section that apply to you.

(i) *Records for a liquid-to-uncaptured gas protocol using a temporary total enclosure or building enclosure.* Records of the mass of total volatile hydrocarbon (TVH) as measured by Method 204A or 204F of appendix M to 40 CFR part 51 for each material used in the coating operation, and the total TVH for all materials used during each capture efficiency test run, including a copy of the test report. Records of the mass of TVH emissions not captured by the capture system that exited the temporary total enclosure or building enclosure during each capture efficiency test run, as measured by Method 204D or 204E of appendix M to 40 CFR part 51, including a copy of the test report. Records documenting that the enclosure used for the capture efficiency test met the criteria in Method 204 of appendix M to 40 CFR part 51 for either a temporary total enclosure or a building enclosure.

(ii) *Records for a gas-to-gas protocol using a temporary total enclosure or a building enclosure.* Records of the mass of TVH emissions captured by the emission capture system as measured by Method 204B or 204C of appendix M to 40 CFR part 51 at the inlet to the add-on control device, including a copy of the test report. Records of the mass of TVH emissions not captured by the capture system that exited the temporary total enclosure or building enclosure during each capture efficiency test run as measured by Method 204D or 204E of

appendix M to 40 CFR part 51, including a copy of the test report. Records documenting that the enclosure used for the capture efficiency test met the criteria in Method 204 of appendix M to 40 CFR part 51 for either a temporary total enclosure or a building enclosure.

(iii) *Records for an alternative protocol.* Records needed to document a capture efficiency determination using an alternative method or protocol as specified in §63.4565(e), if applicable.

(6) The records specified in paragraphs (i)(6)(i) and (ii) of this section for each add-on control device organic HAP destruction or removal efficiency determination as specified in §63.4566.

(i) Records of each add-on control device performance test conducted according to §§63.4564 and 63.4566.

(ii) Records of the coating operation conditions during the add-on control device performance test showing that the performance test was conducted under representative operating conditions.

(7) Records of the data and calculations you used to establish the emission capture and add-on control device operating limits as specified in §63.4567 and to document compliance with the operating limits as specified in Table 1 to this subpart.

(8) A record of the work practice plan required by §63.4493 and documentation that you are implementing the plan on a continuous basis.

§ 63.4531 In what form and for how long must I keep my records?

(a) Your records must be in a form suitable and readily available for expeditious review, according to §63.10(b)(1). Where appropriate, the records may be maintained as electronic spreadsheets or as a database.

(b) As specified in §63.10(b)(1), you must keep each record for 5 years following the date of each occurrence, measurement, maintenance, corrective action, report, or record.

(c) You must keep each record on-site for at least 2 years after the date of each occurrence, measurement, maintenance, corrective action, report, or record according to §63.10(b)(1). You may keep the records off-site for the remaining 3 years.

Compliance Requirements for the Compliant Material Option

§ 63.4540 By what date must I conduct the initial compliance demonstration?

You must complete the initial compliance demonstration for the initial compliance period according to the requirements in §63.4541. The initial compliance period begins on the applicable compliance date specified in §63.4483 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first day of a month, then the initial compliance period extends through that month plus the next 12 months. The initial compliance demonstration includes the calculations according to §63.4541 and supporting documentation showing that during the initial compliance period, you used no coating with an organic HAP content that exceeded the applicable emission limit in §63.4490, and that you used no thinners and/or other additives, or cleaning materials that contained organic HAP as determined according to §63.4541(a).

§ 63.4541 How do I demonstrate initial compliance with the emission limitations?

You may use the compliant material option for any individual coating operation, for any group of coating operations in the affected source, or for all the coating operations in the affected source. You must use either the emission rate without add-on controls option or the emission rate with add-on controls option for any coating operation in the affected source for which you do not use this option. To demonstrate initial compliance using the compliant material option, the coating operation or group of coating operations must use no coating with an organic HAP content that exceeds the applicable emission limits in §63.4490 and must use no thinner and/or other additive, or cleaning material that contains organic HAP as determined according to this section. Any coating operation for which you use the compliant material option is not required to meet the operating limits or work practice standards required in §§63.4492 and 63.4493, respectively. You must conduct a separate initial compliance demonstration for each general use coating, TPO coating, automotive lamp coating, and assembled on-road vehicle coating affected source unless you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c). If you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c), you must demonstrate that all coating operations included in the predominant activity determination or calculation of the facility-specific emission limit comply with that limit. You must meet all the requirements of this section. Use the procedures in this section on each coating, thinner and/or other additive, and cleaning material in the condition it is in when it is received from its manufacturer or supplier and prior to any alteration. You do not need to redetermine the organic HAP content of coatings, thinners and/or other additives, and cleaning materials that are reclaimed on-site (or reclaimed off-site if you have documentation showing that you received back the exact same materials that were sent off-site) and reused in the coating operation for which you use the compliant material option, provided these materials in their condition as received were demonstrated to comply with the compliant material option.

(a) *Determine the mass fraction of organic HAP for each material used.* You must determine the mass fraction of organic HAP for each coating, thinner and/or other additive, and cleaning material used during the compliance period by using one of the options in paragraphs (a)(1) through (5) of this section.

(1) *Method 311 (appendix A to 40 CFR part 63).* You may use Method 311 for determining the mass fraction of organic HAP. Use the procedures specified in paragraphs (a)(1)(i) and (ii) of this section when performing a Method 311 test.

(i) Count each organic HAP that is measured to be present at 0.1 percent by mass or more for Occupational Safety and Health Administration (OSHA)-defined carcinogens as specified in 29 CFR 1910.1200(d)(4) and at 1.0 percent by mass or more for other compounds. For example, if toluene (not an OSHA carcinogen) is measured to be 0.5 percent of the material by mass, you do not have to count it. Express the mass fraction of each organic HAP you count as a value truncated to four places after the decimal point (*e.g.,* 0.3791).

(ii) Calculate the total mass fraction of organic HAP in the test material by adding up the individual organic HAP mass fractions and truncating the result to three places after the decimal point (*e.g.,* 0.763).

(2) *Method 24 (appendix A to 40 CFR part 60).* For coatings, you may use Method 24 to determine the mass fraction of nonaqueous volatile matter and use that value as a substitute for mass fraction of organic HAP. For reactive adhesives in which some of the HAP react to form solids and are not emitted to the atmosphere, you may use the alternative method contained in appendix A to this subpart, rather than Method 24. You may use the volatile fraction that is emitted, as measured by the alternative method in appendix A to this subpart, as a substitute for the mass fraction of organic HAP.

(3) *Alternative method.* You may use an alternative test method for determining the mass fraction of organic HAP once the Administrator has approved it. You must follow the procedure in §63.7(f) to submit an alternative test method for approval.

(4) *Information from the supplier or manufacturer of the material.* You may rely on information other than that generated by the test methods specified in paragraphs (a)(1) through (3) of this section, such as manufacturer's formulation data, if it represents each organic HAP that is present at 0.1 percent by mass or more for OSHA-defined carcinogens as specified in 29 CFR 1910.1200(d)(4) and at 1.0 percent by mass or more for other compounds. For example, if toluene (not an OSHA carcinogen) is 0.5 percent of the material by mass, you do not have to count it. For reactive adhesives in which some of the HAP react to form solids and are not emitted to the atmosphere, you may rely on manufacturer's data that expressly states the organic HAP or volatile matter mass fraction emitted. If there is a disagreement between such information and results of a test conducted according to paragraphs (a)(1) through (3) of this section, then the test method results will take precedence unless, after consultation you demonstrate to the satisfaction of the enforcement agency that the formulation data are correct.

(5) *Solvent blends.* Solvent blends may be listed as single components for some materials in data provided by manufacturers or suppliers. Solvent blends may contain organic HAP which must be counted toward the total organic HAP mass fraction of the materials. When test data and manufacturer's data for solvent blends are not available, you may use the default values for the mass fraction of organic HAP in these solvent blends listed in Table 3 or 4 to this subpart. If you use the tables, you must use the values in Table 3 for all solvent blends that match Table 3 entries according to the instructions for Table 3, and you may use Table 4 only if the solvent blends in the materials you use do not match any of the solvent blends in Table 3 and you know only whether the blend is aliphatic or aromatic. However, if the results of a Method 311 (appendix A to 40 CFR part 63) test indicate higher values than those listed on Table 3 or 4 to this subpart, the Method 311 results will take precedence unless, after consultation you demonstrate to the satisfaction of the enforcement agency that the formulation data are correct.

(b) *Determine the mass fraction of coating solids for each coating.* You must determine the mass fraction of coating solids (kg (lb) of coating solids per kg (lb) of coating) for each coating used during the compliance period by a test, by information provided by the supplier or the manufacturer of the material, or by calculation, as specified in paragraphs (b)(1) through (3) of this section.

(1) *Method 24 (appendix A to 40 CFR part 60).* Use Method 24 for determining the mass fraction of coating solids. For reactive adhesives in which some of the liquid fraction reacts to form solids, you may use the alternative method contained in appendix A to this subpart, rather than Method 24, to determine the mass fraction of coating solids.

(2) *Alternative method.* You may use an alternative test method for determining the solids content of each coating once the Administrator has approved it. You must follow the procedure in §63.7(f) to submit an alternative test method for approval.

(3) *Information from the supplier or manufacturer of the material.* You may obtain the mass fraction of coating solids for each coating from the supplier or manufacturer. If there is disagreement between such information and the test method results, then the test method results will take precedence unless, after consultation you demonstrate to the satisfaction of the enforcement agency that the formulation data are correct.

(c) *Calculate the organic HAP content of each coating.* Calculate the organic HAP content, kg (lb) organic HAP emitted per kg (lb) coating solids used, of each coating used during the compliance period using Equation 1 of this section:

$$H_c = \frac{W_c}{S_c} \qquad (Eq.\ 1)$$

Where:

H_c= Organic HAP content of the coating, kg (lb) of organic HAP emitted per kg (lb) coating solids used.

W_c= Mass fraction of organic HAP in the coating, kg organic HAP per kg coating, determined according to paragraph (a) of this section.

S_c= Mass fraction of coating solids, kg coating solids per kg coating, determined according to paragraph (b) of this section.

(d) *Compliance demonstration.* The calculated organic HAP content for each coating used during the initial compliance period must be less than or equal to the applicable emission limit in §63.4490; and each thinner and/or other additive, and cleaning material used during the initial compliance period must contain no organic HAP, determined according to paragraph (a) of this section. You must keep all records required by §§63.4530 and 63.4531. As part of the notification of compliance status required in §63.4510, you must identify the coating operation(s) for which you used the compliant material option and submit a statement that the coating operation(s) was (were) in compliance with the emission limitations during the initial compliance period because you used no coatings for which the organic HAP content exceeded the applicable emission limit in §63.4490, and you used no thinners and/or other additives, or cleaning materials that contained organic HAP, determined according to the procedures in paragraph (a) of this section.

§ 63.4542 How do I demonstrate continuous compliance with the emission limitations?

(a) For each compliance period to demonstrate continuous compliance, you must use no coating for which the organic HAP content (determined using Equation 1 of §63.4541) exceeds the applicable emission limit in §63.4490, and use no thinner and/or other additive, or cleaning material that contains organic HAP, determined according to §63.4541(a). A compliance period consists of 12 months. Each month, after the end of the initial compliance period described in §63.4540, is the end of a compliance period consisting of that month and the preceding 11 months. If you are complying with a facility-specific emission limit under §63.4490(c), you must also perform the calculation using Equation 1 in §63.4490(c)(2) on a monthly basis using the data from the previous 12 months of operation.

(b) If you choose to comply with the emission limitations by using the compliant material option, the use of any coating, thinner and/or other additive, or cleaning material that does not meet the criteria specified in paragraph (a) of this section is a deviation from the emission limitations that must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(5).

(c) As part of each semiannual compliance report required by §63.4520, you must identify the coating operation(s) for which you used the compliant material option. If there were no deviations from the applicable emission limit in §63.4490, submit a statement that the coating operation(s) was (were) in compliance with the emission limitations during the reporting period because you used no coatings for which the organic HAP content exceeded the applicable emission limit in §63.4490, and you used no thinner and/or other additive, or cleaning material that contained organic HAP, determined according to §63.4541(a).

(d) You must maintain records as specified in §§63.4530 and 63.4531.

Compliance Requirements for the Emission Rate Without Add-On Controls Option

§ 63.4550 By what date must I conduct the initial compliance demonstration?

You must complete the initial compliance demonstration for the initial compliance period according to the requirements of §63.4551. The initial compliance period begins on the applicable compliance date specified in §63.4483 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first day of a month, then the initial compliance period extends through the end of that month plus the next 12 months. You must determine the mass of organic HAP emissions and mass of coating solids used each month and then calculate an organic HAP emission rate at the end of the initial compliance period. The initial compliance demonstration includes the

calculations according to §63.4551 and supporting documentation showing that during the initial compliance period the organic HAP emission rate was equal to or less than the applicable emission limit in §63.4490.

§ 63.4551 How do I demonstrate initial compliance with the emission limitations?

You may use the emission rate without add-on controls option for any individual coating operation, for any group of coating operations in the affected source, or for all the coating operations in the affected source. You must use either the compliant material option or the emission rate with add-on controls option for any coating operation in the affected source for which you do not use this option. To demonstrate initial compliance using the emission rate without add-on controls option, the coating operation or group of coating operations must meet the applicable emission limit in §63.4490, but is not required to meet the operating limits or work practice standards in §§63.4492 and 63.4493, respectively. You must conduct a separate initial compliance demonstration for each general use, TPO, automotive lamp, and assembled on-road vehicle coating operation unless you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c). If you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c), you must demonstrate that all coating operations included in the predominant activity determination or calculation of the facility-specific emission limit comply with that limit. You must meet all the requirements of this section. When calculating the organic HAP emission rate according to this section, do not include any coatings, thinners and/or other additives, or cleaning materials used on coating operations for which you use the compliant material option or the emission rate with add-on controls option. You do not need to redetermine the mass of organic HAP in coatings, thinners and/or other additives, or cleaning materials that have been reclaimed on-site (or reclaimed off-site if you have documentation showing that you received back the exact same materials that were sent off-site) and reused in the coating operation for which you use the emission rate without add-on controls option. If you use coatings, thinners and/or other additives, or cleaning materials that have been reclaimed on-site, the amount of each used in a month may be reduced by the amount of each that is reclaimed. That is, the amount used may be calculated as the amount consumed to account for materials that are reclaimed.

(a) *Determine the mass fraction of organic HAP for each material.* Determine the mass fraction of organic HAP for each coating, thinner and/or other additive, and cleaning material used during each month according to the requirements in §63.4541(a).

(b) *Determine the mass fraction of coating solids.* Determine the mass fraction of coating solids (kg (lb) of coating solids per kg (lb) of coating) for each coating used during each month according to the requirements in §63.4541(b).

(c) *Determine the density of each material.* Determine the density of each liquid coating, thinner and/or other additive, and cleaning material used during each month from test results using ASTM Method D1475–98, “Standard Test Method for Density of Liquid Coatings, Inks, and Related Products” (incorporated by reference, see §63.14), information from the supplier or manufacturer of the material, or reference sources providing density or specific gravity data for pure materials. If there is disagreement between ASTM Method D1475–98 and other such information sources, the test results will take precedence unless, after consultation you demonstrate to the satisfaction of the enforcement agency that the formulation data are correct. If you purchase materials or monitor consumption by weight instead of volume, you do not need to determine material density. Instead, you may use the material weight in place of the combined terms for density and volume in Equations 1A, 1B, 1C, and 2 of this section.

(d) *Determine the volume of each material used.* Determine the volume (liters) of each coating, thinner and/or other additive, and cleaning material used during each month by measurement or usage records. If you purchase materials or monitor consumption by weight instead of volume,

you do not need to determine the volume of each material used. Instead, you may use the material weight in place of the combined terms for density and volume in Equations 1A, 1B, 1C, and 2 of this section.

(e) *Calculate the mass of organic HAP emissions.* The mass of organic HAP emissions is the combined mass of organic HAP contained in all coatings, thinners and/or other additives, and cleaning materials used during each month minus the organic HAP in certain waste materials. Calculate the mass of organic HAP emissions using Equation 1 of this section.

$$H_e = A + B + C - R_w \qquad (Eq.\ 1)$$

Where:

H_e= Total mass of organic HAP emissions during the month, kg.

A = Total mass of organic HAP in the coatings used during the month, kg, as calculated in Equation 1A of this section.

B = Total mass of organic HAP in the thinners and/or other additives used during the month, kg, as calculated in Equation 1B of this section.

C = Total mass of organic HAP in the cleaning materials used during the month, kg, as calculated in Equation 1C of this section.

R_w= Total mass of organic HAP in waste materials sent or designated for shipment to a hazardous waste TSDF for treatment or disposal during the month, kg, determined according to paragraph (e)(4) of this section. (You may assign a value of zero to $R_W$if you do not wish to use this allowance.)

(1) Calculate the kg organic HAP in the coatings used during the month using Equation 1A of this section:

$$A = \sum_{i=1}^{m} \left(Vol_{c,i}\right)\left(D_{c,i}\right)\left(W_{c,i}\right) \qquad (Eq.\ 1A)$$

Where:

A = Total mass of organic HAP in the coatings used during the month, kg.

Volc,i= Total volume of coating, i, used during the month, liters.

Dc,i= Density of coating, i, kg coating per liter coating.

Wc,i= Mass fraction of organic HAP in coating, i, kg organic HAP per kg coating. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

m = Number of different coatings used during the month.

(2) Calculate the kg of organic HAP in the thinners and/or other additives used during the month using Equation 1B of this section:

$$B = \sum_{j=1}^{n} \left(Vol_{t,j}\right)\left(\mathrm{D}_{t,j}\right)\left(\mathrm{W}_{t,j}\right) \qquad (Eq.\ 1B)$$

Where:

B = Total mass of organic HAP in the thinners and/or other additives used during the month, kg.

$Vol_{t,j}$= Total volume of thinner and/or other additive, j, used during the month, liters.

$D_{t,j}$= Density of thinner and/or other additive, j, kg per liter.

$W_{t,j}$= Mass fraction of organic HAP in thinner and/or other additive, j, kg organic HAP per kg thinner and/or other additive. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

n = Number of different thinners and/or other additives used during the month.

(3) Calculate the kg organic HAP in the cleaning materials used during the month using Equation 1C of this section:

$$C = \sum_{k=1}^{p} (Vol_{s,k})(D_{s,k})(W_{s,k}) \qquad (Eq.\ 1C)$$

Where:

C = Total mass of organic HAP in the cleaning materials used during the month, kg.

$Vol_{s,k}$= Total volume of cleaning material, k, used during the month, liters.

$D_{s,k}$= Density of cleaning material, k, kg per liter.

$W_{s,k}$= Mass fraction of organic HAP in cleaning material, k, kg organic HAP per kg material.

p = Number of different cleaning materials used during the month.

(4) If you choose to account for the mass of organic HAP contained in waste materials sent or designated for shipment to a hazardous waste TSDF in Equation 1 of this section, then you must determine the mass according to paragraphs (e)(4)(i) through (iv) of this section.

(i) You may only include waste materials in the determination that are generated by coating operations in the affected source for which you use Equation 1 of this section and that will be treated or disposed of by a facility that is regulated as a TSDF under 40 CFR part 262, 264, 265, or 266. The TSDF may be either off-site or on-site. You may not include organic HAP contained in wastewater.

(ii) You must determine either the amount of the waste materials sent to a TSDF during the month or the amount collected and stored during the month and designated for future transport to a TSDF. Do not include in your determination any waste materials sent to a TSDF during a month if you have already included them in the amount collected and stored during that month or a previous month.

(iii) Determine the total mass of organic HAP contained in the waste materials specified in paragraph (e)(4)(ii) of this section.

(iv) You must document the methodology you use to determine the amount of waste materials and the total mass of organic HAP they contain, as required in §63.4530(g). If waste manifests include this information, they may be used as

part of the documentation of the amount of waste materials and mass of organic HAP contained in them.

(f) *Calculate the total mass of coating solids used.* Determine the total mass of coating solids used, kg, which is the combined mass of coating solids for all the coatings used during each month, using Equation 2 of this section:

$$M_{st} = \sum_{i=1}^{m} (\mathrm{Vol}_{c,i})(\mathrm{D}_{c,i})(\mathrm{M}_{s,i}) \qquad (Eq.\ 2)$$

Where:

M_{st}= Total mass of coating solids used during the month, kg.

$Vol_{c,i}$= Total volume of coating, i, used during the month, liters.

$D_{c,i}$= Density of coating, i, kgs per liter coating, determined according to §63.4551(c).

$M_{s,i}$= Mass fraction of coating solids for coating, i, kgs solids per kg coating, determined according to §63.4541(b).

m = Number of coatings used during the month.

(g) *Calculate the organic HAP emission rate.* Calculate the organic HAP emission rate for the compliance period, kg (lb) organic HAP emitted per kg (lb) coating solids used, using Equation 3 of this section:

$$H_{yr} = \frac{\sum_{y=1}^{n} H_e}{\sum_{y=1}^{n} M_{st}} \qquad (Eq.\ 3)$$

Where:

H_{yr}= Average organic HAP emission rate for the compliance period, kg organic HAP emitted per kg coating solids used.

H_e= Total mass of organic HAP emissions from all materials used during month, y, kg, as calculated by Equation 1 of this section.

M_{st}= Total mass of coating solids used during month, y, kg, as calculated by Equation 2 of this section.

y = Identifier for months.

n = Number of full or partial months in the compliance period (for the initial compliance period, n equals 12 if the compliance date falls on the first day of a month; otherwise n equals 13; for all following compliance periods, n equals 12).

(h) *Compliance demonstration.* The organic HAP emission rate for the initial compliance period calculated using Equation 3 of this section must be less than or equal to the applicable emission limit for each subcategory in §63.4490 or the predominant activity or facility-specific emission limit allowed in §63.4490(c). You must keep all records as required by §§63.4530 and 63.4531. As part of the notification of compliance status required by §63.4510, you must identify the coating operation(s) for which you used the emission rate without add-on controls option and submit a statement that the coating operation(s) was (were) in compliance with the emission limitations

during the initial compliance period because the organic HAP emission rate was less than or equal to the applicable emission limit in §63.4490, determined according to the procedures in this section.

§ 63.4552 How do I demonstrate continuous compliance with the emission limitations?

(a) To demonstrate continuous compliance, the organic HAP emission rate for each compliance period, determined according to §63.4551(a) through (g), must be less than or equal to the applicable emission limit in §63.4490. A compliance period consists of 12 months. Each month after the end of the initial compliance period described in §63.4550 is the end of a compliance period consisting of that month and the preceding 11 months. You must perform the calculations in §63.4551(a) through (g) on a monthly basis using data from the previous 12 months of operation. If you are complying with a facility-specific emission limit under §63.4490(c), you must also perform the calculation using Equation 1 in §63.4490(c)(2) on a monthly basis using the data from the previous 12 months of operation.

(b) If the organic HAP emission rate for any 12-month compliance period exceeded the applicable emission limit in §63.4490, this is a deviation from the emission limitation for that compliance period and must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(6).

(c) As part of each semiannual compliance report required by §63.4520, you must identify the coating operation(s) for which you used the emission rate without add-on controls option. If there were no deviations from the emission limitations, you must submit a statement that the coating operation(s) was (were) in compliance with the emission limitations during the reporting period because the organic HAP emission rate for each compliance period was less than or equal to the applicable emission limit in §63.4490, determined according to §63.4551(a) through (g).

(d) You must maintain records as specified in §§63.4530 and 63.4531.

Compliance Requirements for the Emission Rate With Add-On Controls Option

§ 63.4560 By what date must I conduct performance tests and other initial compliance demonstrations?

(a) *New and reconstructed affected sources.* For a new or reconstructed affected source, you must meet the requirements of paragraphs (a)(1) through (4) of this section.

(1) All emission capture systems, add-on control devices, and CPMS must be installed and operating no later than the applicable compliance date specified in §63.4483. Except for solvent recovery systems for which you conduct liquid-liquid material balances according to §63.4561(j), you must conduct a performance test of each capture system and add-on control device according to §§63.4564, 63.4565, and 63.4566 and establish the operating limits required by §63.4492 no later than 180 days after the applicable compliance date specified in §63.4483. For a solvent recovery system for which you conduct liquid-liquid material balances according to §63.4561(j), you must initiate the first material balance no later than the applicable compliance date specified in §63.4483.

(2) You must develop and begin implementing the work practice plan required by §63.4493 no later than the compliance date specified in §63.4483.

(3) You must complete the initial compliance demonstration for the initial compliance period according to the requirements of §63.4561. The initial compliance period begins on the applicable compliance date specified in §63.4483 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first day of a month, then the initial compliance period extends through the end of that month plus the next 12 months. You must determine the mass of organic HAP emissions and mass of coatings solids used each month and then calculate an organic HAP emission rate at the end of the initial compliance period. The initial compliance demonstration includes the results of emission capture system and add-on control device

performance tests conducted according to §§63.4564, 63.4565, and 63.4566; results of liquid-liquid material balances conducted according to §63.4561(j); calculations according to §63.4561 and supporting documentation showing that during the initial compliance period the organic HAP emission rate was equal to or less than the applicable emission limit in §63.4490; the operating limits established during the performance tests and the results of the continuous parameter monitoring required by §63.4568; and documentation of whether you developed and implemented the work practice plan required by §63.4493.

(4) You do not need to comply with the operating limits for the emission capture system and add-on control device required by §63.4492 until after you have completed the performance tests specified in paragraph (a)(1) of this section. Instead, you must maintain a log detailing the operation and maintenance of the emission capture system, add-on control device, and continuous parameter monitors during the period between the compliance date and the performance test. You must begin complying with the operating limits for your affected source on the date you complete the performance tests specified in paragraph (a)(1) of this section. The requirements in this paragraph (a)(4) do not apply to solvent recovery systems for which you conduct liquid-liquid material balances according to the requirements in §63.4561(j).

(b) *Existing affected sources.* For an existing affected source, you must meet the requirements of paragraphs (b)(1) through (3) of this section.

(1) All emission capture systems, add-on control devices, and CPMS must be installed and operating no later than the applicable compliance date specified in §63.4483. Except for solvent recovery systems for which you conduct liquid-liquid material balances according to §63.4561(j), you must conduct a performance test of each capture system and add-on control device according to the procedures in §§63.4564, 63.4565, and 63.4566 and establish the operating limits required by §63.4492 no later than the compliance date specified in §63.4483. For a solvent recovery system for which you conduct liquid-liquid material balances according to §63.4561(j), you must initiate the first material balance no later than the compliance date specified in §63.4483.

(2) You must develop and begin implementing the work practice plan required by §63.4493 no later than the compliance date specified in §63.4483.

(3) You must complete the initial compliance demonstration for the initial compliance period according to the requirements of §63.4561. The initial compliance period begins on the applicable compliance date specified in §63.4483 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first day of a month, then the initial compliance period extends through the end of that month plus the next 12 months. You must determine the mass of organic HAP emissions and mass of coatings solids used each month and then calculate an organic HAP emission rate at the end of the initial compliance period. The initial compliance demonstration includes the results of emission capture system and add-on control device performance tests conducted according to §§63.4564, 63.4565, and 63.4566; results of liquid-liquid material balances conducted according to §63.4561(j); calculations according to §63.4561 and supporting documentation showing that during the initial compliance period the organic HAP emission rate was equal to or less than the applicable emission limit in §63.4490; the operating limits established during the performance tests and the results of the continuous parameter monitoring required by §63.4568; and documentation of whether you developed and implemented the work practice plan required by §63.4493.

(c) You are not required to conduct an initial performance test to determine capture efficiency or destruction efficiency of a capture system or control device if you receive approval to use the results of a performance test that has been previously conducted on that capture system or control device. Any such previous tests must meet the conditions described in paragraphs (c)(1) through (3) of this section.

(1) The previous test must have been conducted using the methods and conditions specified

in this subpart.

(2) Either no process or equipment changes must have been made since the previous test was performed, or the owner or operator must be able to demonstrate that the results of the performance test, with or without adjustments, reliably demonstrate compliance despite process or equipment changes.

(3) Either the required operating parameters were established in the previous test or sufficient data were collected in the previous test to establish the required operating parameters.

§ 63.4561 How do I demonstrate initial compliance?

(a) You may use the emission rate with add-on controls option for any coating operation, for any group of coating operations in the affected source, or for all of the coating operations in the affected source. You may include both controlled and uncontrolled coating operations in a group for which you use this option. You must use either the compliant material option or the emission rate without add-on controls option for any coating operation in the affected source for which you do not use the emission rate with add-on controls option. To demonstrate initial compliance, the coating operation(s) for which you use the emission rate with add-on controls option must meet the applicable emission limitations in §§63.4490, 63.4492, and 63.4493. You must conduct a separate initial compliance demonstration for each general use, TPO, automotive lamp, and assembled on-road vehicle coating operation, unless you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c). If you are demonstrating compliance with a predominant activity or facility-specific emission limit as provided in §63.4490(c), you must demonstrate that all coating operations included in the predominant activity determination or calculation of the facility-specific emission limit comply with that limit. You must meet all the requirements of this section. When calculating the organic HAP emission rate according to this section, do not include any coatings, thinners and/or other additives, or cleaning materials used on coating operations for which you use the compliant material option or the emission rate without add-on controls option. You do not need to redetermine the mass of organic HAP in coatings, thinners and/or other additives, or cleaning materials that have been reclaimed onsite (or reclaimed off-site if you have documentation showing that you received back the exact same materials that were sent off-site) and reused in the coatings operation(s) for which you use the emission rate with add-on controls option. If you use coatings, thinners and/or other additives, or cleaning materials that have been reclaimed on-site, the amount of each used in a month may be reduced by the amount of each that is reclaimed. That is, the amount used may be calculated as the amount consumed to account for materials that are reclaimed.

(b) *Compliance with operating limits.* Except as provided in §63.4560(a)(4), and except for solvent recovery systems for which you conduct liquid-liquid material balances according to the requirements of paragraph (j) of this section, you must establish and demonstrate continuous compliance during the initial compliance period with the operating limits required by §63.4492, using the procedures specified in §§63.4567 and 63.4568.

(c) *Compliance with work practice requirements.* You must develop, implement, and document your implementation of the work practice plan required by §63.4493 during the initial compliance period, as specified in §63.4530.

(d) *Compliance with emission limits.* You must follow the procedures in paragraphs (e) through (n) of this section to demonstrate compliance with the applicable emission limit in §63.4490 for each affected source in each subcategory.

(e) *Determine the mass fraction of organic HAP, density, volume used, and mass fraction of coating solids.* Follow the procedures specified in §63.4551(a) through (d) to determine the mass fraction of organic HAP, density, and volume of each coating, thinner and/or other additive, and cleaning material used during each month; and the mass fraction of coating solids for each coating used during each month.

(f) *Calculate the total mass of organic HAP emissions before add-on controls.* Using Equation 1 of §63.4551, calculate the total mass of organic HAP emissions before add-on controls from all coatings, thinners and/or other additives, and cleaning materials used during each month in the coating operation or group of coating operations for which you use the emission rate with add-on controls option.

(g) *Calculate the organic HAP emission reduction for each controlled coating operation.* Determine the mass of organic HAP emissions reduced for each controlled coating operation during each month. The emission reduction determination quantifies the total organic HAP emissions that pass through the emission capture system and are destroyed or removed by the add-on control device. Use the procedures in paragraph (h) of this section to calculate the mass of organic HAP emission reduction for each controlled coating operation using an emission capture system and add-on control device other than a solvent recovery system for which you conduct liquid-liquid material balances. For each controlled coating operation using a solvent recovery system for which you conduct a liquid-liquid material balance, use the procedures in paragraph (j) of this section to calculate the organic HAP emission reduction.

(h) *Calculate the organic HAP emission reduction for each controlled coating operation not using liquid-liquid material balance.* Use Equation 1 of this section to calculate the organic HAP emission reduction for each controlled coating operation using an emission capture system and add-on control device other than a solvent recovery system for which you conduct liquid-liquid material balances. The calculation applies the emission capture system efficiency and add-on control device efficiency to the mass of organic HAP contained in the coatings, thinners and/or other additives, and cleaning materials that are used in the coating operation served by the emission capture system and add-on control device during each month. You must assume zero efficiency for the emission capture system and add-on control device for any period of time a deviation specified in §63.4563(c) or (d) occurs in the controlled coating operation, including a deviation during a period of startup, shutdown, or malfunction, unless you have other data indicating the actual efficiency of the emission capture system and add-on control device and the use of these data is approved by the Administrator. Equation 1 of this section treats the materials used during such a deviation as if they were used on an uncontrolled coating operation for the time period of the deviation.

$$H_C = \left(A_C + B_C + C_C - R_W - H_{UNC}\right)\left(\frac{CE}{100} \times \frac{DRE}{100}\right) \qquad (Eq.\ 1)$$

Where:

H_C= Mass of organic HAP emission reduction for the controlled coating operation during the month, kg.

A_C= Total mass of organic HAP in the coatings used in the controlled coating operation during the month, kg, as calculated in Equation 1A of this section.

B_C= Total mass of organic HAP in the thinners and/or other additives used in the controlled coating operation during the month, kg, as calculated in Equation 1B of this section.

C_C= Total mass of organic HAP in the cleaning materials used in the controlled coating operation during the month, kg, as calculated in Equation 1C of this section.

R_w= Total mass of organic HAP in waste materials sent or designated for shipment to a hazardous waste TSDF for treatment or disposal during the compliance period, kg, determined

according to §63.4951(e)(4). (You may assign a value of zero to $R_w$if you do not wish to use this allowance.)

H_{UNC}= Total mass of organic HAP in the coatings, thinners and/or other additives, and cleaning materials used during all deviations specified in §63.4563(c) and (d) that occurred during the month in the controlled coating operation, kg, as calculated in Equation 1D of this section.

CE = Capture efficiency of the emission capture system vented to the add-on control device, percent. Use the test methods and procedures specified in §§63.4564 and 63.4565 to measure and record capture efficiency.

DRE = Organic HAP destruction or removal efficiency of the add-on control device, percent. Use the test methods and procedures in §§63.4564 and 63.4566 to measure and record the organic HAP destruction or removal efficiency.

(1) Calculate the mass of organic HAP in the coatings used in the controlled coating operation, kg (lb), using Equation 1A of this section:

$$A_C = \sum_{i=1}^{m} (Vol_{c,i})(D_{c,i})(W_{c,i}) \quad (Eq.\ 1A)$$

Where:

A_C= Total mass of organic HAP in the coatings used in the controlled coating operation during the month, kg.

$Vol_{c,i}$= Total volume of coating, i, used during the month, liters.

$D_{c,i}$= Density of coating, i, kg per liter.

$W_{c,i}$= Mass fraction of organic HAP in coating, i, kg per kg. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

m = Number of different coatings used.

(2) Calculate the mass of organic HAP in the thinners and/or other additives used in the controlled coating operation, kg (lb), using Equation 1B of this section:

$$B_C = \sum_{j=1}^{n} (Vol_{t,j})(D_{t,j})(W_{t,j}) \qquad (Eq.\ 1B)$$

Where:

B_C= Total mass of organic HAP in the thinners and/or other additives used in the controlled coating operation during the month, kg.

$Vol_{t,j}$= Total volume of thinner and/or other additive, j, used during the month, liters.

$D_{t,j}$= Density of thinner and/or other additive, j, kg per liter.

$W_{t,j}$= Mass fraction of organic HAP in thinner and/or other additive, j, kg per kg. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

n = Number of different thinners and/or other additives used.

(3) Calculate the mass of organic HAP in the cleaning materials used in the controlled

coating operation during the month, kg (lb), using Equation 1C of this section:

$$C_C = \sum_{k=1}^{p} (Vol_{s,k})(D_{s,k})(W_{s,k}) \quad (Eq.\ 1C)$$

Where:

C_C= Total mass of organic HAP in the cleaning materials used in the controlled coating operation during the month, kg.

$Vol_{s,k}$= Total volume of cleaning material, k, used during the month, liters.

$D_{s,k}$= Density of cleaning material, k, kg per liter.

$W_{s,k}$= Mass fraction of organic HAP in cleaning material, k, kg per kg.

p = Number of different cleaning materials used.

(4) Calculate the mass of organic HAP in the coatings, thinners and/or other additives, and cleaning materials used in the controlled coating operation during deviations specified in §63.4563(c) and (d), using Equation 1D of this section:

$$H_{UNC} = \sum_{h=1}^{q} (Vol_h)(D_h)(W_h) \quad (Eq.\ 1D)$$

Where:

H_{UNC}= Total mass of organic HAP in the coatings, thinners and/or other additives, and cleaning materials used during all deviations specified in §63.4563(c) and (d) that occurred during the month in the controlled coating operation, kg.

Vol_h= Total volume of coating, thinner and/or other additive, or cleaning material, h, used in the controlled coating operation during deviations, liters.

D_h= Density of coating, thinner and/or other additives, or cleaning material, h, kg per liter.

W_h= Mass fraction of organic HAP in coating, thinner and/or other additives, or cleaning material, h, kg organic HAP per kg coating. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

q = Number of different coatings, thinners and/or other additives, and cleaning materials used.

(i) [Reserved]

(j) *Calculate the organic HAP emission reduction for each controlled coating operation using liquid-liquid material balances.* For each controlled coating operation using a solvent recovery system for which you conduct liquid-liquid material balances, calculate the organic HAP emission reduction by applying the volatile organic matter collection and recovery efficiency to the mass of organic HAP contained in the coatings, thinners and/or other additives, and cleaning materials that are used in the coating operation controlled by the solvent recovery system during each month. Perform a liquid-liquid material balance for each month as specified in paragraphs (j)(1) through (6) of this section. Calculate the mass of organic HAP emission reduction by the solvent recovery system as specified in paragraph (j)(7) of this section.

(1) For each solvent recovery system, install, calibrate, maintain, and operate according to

the manufacturer's specifications, a device that indicates the cumulative amount of volatile organic matter recovered by the solvent recovery system each month. The device must be initially certified by the manufacturer to be accurate to within ±2.0 percent of the mass of volatile organic matter recovered.

(2) For each solvent recovery system, determine the mass of volatile organic matter recovered for the month, based on measurement with the device required in paragraph (j)(1) of this section.

(3) Determine the mass fraction of volatile organic matter for each coating, thinner and/or other additive, and cleaning material used in the coating operation controlled by the solvent recovery system during the month, kg volatile organic matter per kg coating. You may determine the volatile organic matter mass fraction using Method 24 of 40 CFR part 60, appendix A, or an EPA approved alternative method, or you may use information provided by the manufacturer or supplier of the coating. In the event of any inconsistency between information provided by the manufacturer or supplier and the results of Method 24 of 40 CFR part 60, appendix A, or an approved alternative method, the test method results will take precedence unless, after consultation you demonstrate to the satisfaction of the enforcement agency that the formulation data are correct.

(4) Determine the density of each coating, thinner and/or other additive, and cleaning material used in the coating operation controlled by the solvent recovery system during the month, kg per liter, according to §63.4551(c).

(5) Measure the volume of each coating, thinner and/or other additive, and cleaning material used in the coating operation controlled by the solvent recovery system during the month, liters.

(6) Each month, calculate the solvent recovery system's volatile organic matter collection and recovery efficiency, using Equation 2 of this section:

$$R_V = 100 \frac{M_{VR}}{\sum_{i=1}^{m} Vol_i D_i WV_{c,i} + \sum_{j=1}^{n} Vol_j D_j WV_{t,j} + \sum_{k=1}^{p} Vol_k D_k WV_{s,k}} \qquad (Eq.\ 2)$$

Where:

R_V= Volatile organic matter collection and recovery efficiency of the solvent recovery system during the month, percent.

M_{VR}= Mass of volatile organic matter recovered by the solvent recovery system during the month, kg.

Vol_i= Volume of coating, i, used in the coating operation controlled by the solvent recovery system during the month, liters.

D_i= Density of coating, i, kg per liter.

$WV_{c,i}$= Mass fraction of volatile organic matter for coating, i, kg volatile organic matter per kg coating. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

Vol_j= Volume of thinner and/or other additive, j, used in the coating operation controlled by the solvent recovery system during the month, liters.

D_j= Density of thinner and/or other additive, j, kg per liter.

$WV_{t,j}$= Mass fraction of volatile organic matter for thinner and/or other additive, j, kg volatile organic matter per kg thinner and/or other additive. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

Vol_k= Volume of cleaning material, k, used in the coating operation controlled by the solvent recovery system during the month, liters.

D_k= Density of cleaning material, k, kg per liter.

$WV_{s,k}$= Mass fraction of volatile organic matter for cleaning material, k, kg volatile organic matter per kg cleaning material.

m = Number of different coatings used in the coating operation controlled by the solvent recovery system during the month.

n = Number of different thinners and/or other additives used in the coating operation controlled by the solvent recovery system during the month.

p = Number of different cleaning materials used in the coating operation controlled by the solvent recovery system during the month.

(7) Calculate the mass of organic HAP emission reduction for the coating operation controlled by the solvent recovery system during the month, using Equation 3 of this section and according to paragraphs (j)(7)(i) through (iii) of this section:

$$H_{CSR} = \left(A_{CSR} + B_{CSR} + C_{CSR}\right)\left(\frac{R_v}{100}\right) \qquad (Eq.\ 3)$$

Where:

H_{CSR}= Mass of organic HAP emission reduction for the coating operation controlled by the solvent recovery system using a liquid-liquid material balance during the month, kg.

A_{CSR}= Total mass of organic HAP in the coatings used in the coating operation controlled by the solvent recovery system, kg, calculated using Equation 3A of this section.

B_{CSR}= Total mass of organic HAP in the thinners and/or other additives used in the coating operation controlled by the solvent recovery system, kg, calculated using Equation 3B of this section.

C_{CSR}= Total mass of organic HAP in the cleaning materials used in the coating operation controlled by the solvent recovery system, kg, calculated using Equation 3C of this section.

R_V= Volatile organic matter collection and recovery efficiency of the solvent recovery system, percent, from Equation 2 of this section.

(i) Calculate the mass of organic HAP in the coatings used in the coating operation controlled by the solvent recovery system, kg, using Equation 3A of this section.

$$A_{CSR} = \sum_{i=1}^{m}\left(Vol_{c,i}\right)\left(D_{c,i}\right)\left(W_{c,i}\right) \qquad (Eq.\ 3A)$$

Where:

A_{CSR}= Total mass of organic HAP in the coatings used in the coating operation

controlled by the solvent recovery system during the month, kg.

$Vol_{c,i}$= Total volume of coating, i, used during the month in the coating operation controlled by the solvent recovery system, liters.

$D_{c,i}$= Density of coating, i, kg per liter.

$W_{c,i}$= Mass fraction of organic HAP in coating, i, kg organic HAP per kg coating. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

m = Number of different coatings used.

(ii) Calculate the mass of organic HAP in the thinners and/or other additives used in the coating operation controlled by the solvent recovery system, kg, using Equation 3B of this section:

$$B_{CSR} = \sum_{j=1}^{n} (Vol_{t,j})(D_{t,j})(W_{t,j}) \quad (Eq.\ 3B)$$

Where:

B_{CSR}= Total mass of organic HAP in the thinners and/or other additives used in the coating operation controlled by the solvent recovery system during the month, kg.

$Vol_{t,j}$= Total volume of thinner and/or other additive, j, used during the month in the coating operation controlled by the solvent recovery system, liters.

$D_{t,j}$= Density of thinner and/or other additive, j, kg per liter.

$W_{t,j}$= Mass fraction of organic HAP in thinner and/or other additive, j, kg organic HAP per kg thinner and/or other additive. For reactive adhesives as defined in §63.4581, use the mass fraction of organic HAP that is emitted as determined using the method in appendix A to this subpart.

n = Number of different thinners and/or other additives used.

(iii) Calculate the mass of organic HAP in the cleaning materials used in the coating operation controlled by the solvent recovery system during the month, kg, using Equation 3C of this section:

$$C_{CSR} = \sum_{k=1}^{p} (Vol_{s,k})(D_{s,k})(W_{s,k}) \quad (Eq.\ 3C)$$

Where:

C_{CSR}= Total mass of organic HAP in the cleaning materials used in the coating operation controlled by the solvent recovery system during the month, kg.

$Vol_{s,k}$= Total volume of cleaning material, k, used during the month in the coating operation controlled by the solvent recovery system, liters.

$D_{s,k}$= Density of cleaning material, k, kg per liter.

$W_{s,k}$= Mass fraction of organic HAP in cleaning material, k, kg organic HAP per kg cleaning material.

p = Number of different cleaning materials used.

(k) *Calculate the total mass of coating solids used.* Determine the total mass of coating solids used, kg, which is the combined mass of coating solids for all the coatings used during each month in the coating operation or group of coating operations for which you use the emission rate with add-on controls option, using Equation 2 of §63.4551.

(l) *Calculate the mass of organic HAP emissions for each month.* Determine the mass of organic HAP emissions, kg, during each month, using Equation 4 of this section:

$$H_{HAP} = H_e - \sum_{i=1}^{q}\left(H_{C,i}\right) - \sum_{j=1}^{r}\left(H_{CSR,j}\right) \qquad (Eq.\ 4)$$

Where:

H_{HAP}= Total mass of organic HAP emissions for the month, kg.

H_e= Total mass of organic HAP emissions before add-on controls from all the coatings, thinners and/or other additives, and cleaning materials used during the month, kg, determined according to paragraph (f) of this section.

$H_{C,i}$= Total mass of organic HAP emission reduction for controlled coating operation, i, not using a liquid-liquid material balance, during the month, kg, from Equation 1 of this section.

$H_{CSR,j}$= Total mass of organic HAP emission reduction for coating operation, j, controlled by a solvent recovery system using a liquid-liquid material balance, during the month, kg, from Equation 3 of this section.

q = Number of controlled coating operations not controlled by a solvent recovery system using a liquid-liquid material balance.

r = Number of coating operations controlled by a solvent recovery system using a liquid-liquid material balance.

(m) *Calculate the organic HAP emission rate for the compliance period.* Determine the organic HAP emission rate for the compliance period, kg (lb) of organic HAP emitted per kg (lb) coating solids used, using Equation 5 of this section:

$$H_{annual} = \frac{\sum_{y=1}^{n} H_{HAP,y}}{\sum_{y=1}^{n} M_{st,y}} \qquad (Eq.\ 5)$$

Where:

H_{annual}= Organic HAP emission rate for the compliance period, kg organic HAP emitted per kg coating solids used.

$H_{HAP,y}$= Organic HAP emissions for month, y, kg, determined according to Equation 4 of this section.

$M_{st,y}$= Total mass of coating solids used during month, y, kg, from Equation 2 of §63.4551.

y = Identifier for months.

n = Number of full or partial months in the compliance period (for the initial compliance period, n equals 12 if the compliance date falls on the first day of a month; otherwise n equals 13; for all following compliance periods, n equals 12).

(n) *Compliance demonstration.* The organic HAP emission rate for the initial compliance period, calculated using Equation 5 of this section, must be less than or equal to the applicable emission limit for each subcategory in §63.4490 or the predominant activity or facility-specific emission limit allowed in §63.4490(c). You must keep all records as required by §§63.4530 and 63.4531. As part of the notification of compliance status required by §63.4510, you must identify the coating operation(s) for which you used the emission rate with add-on controls option and submit a statement that the coating operation(s) was (were) in compliance with the emission limitations during the initial compliance period because the organic HAP emission rate was less than or equal to the applicable emission limit in §63.4490, and you achieved the operating limits required by §63.4492 and the work practice standards required by §63.4493.

§ 63.4562 [Reserved]

§ 63.4563 How do I demonstrate continuous compliance with the emission limitations?

(a) To demonstrate continuous compliance with the applicable emission limit in §63.4490, the organic HAP emission rate for each compliance period, determined according to the procedures in §63.4561, must be equal to or less than the applicable emission limit in §63.4490. A compliance period consists of 12 months. Each month after the end of the initial compliance period described in §63.4560 is the end of a compliance period consisting of that month and the preceding 11 months. You must perform the calculations in §63.4561 on a monthly basis using data from the previous 12 months of operation. If you are complying with a facility-specific emission limit under §63.4490(c), you must also perform the calculation using Equation 1 in §63.4490(c)(2) on a monthly basis using the data from the previous 12 months of operation.

(b) If the organic HAP emission rate for any 12-month compliance period exceeded the applicable emission limit in §63.4490, this is a deviation from the emission limitation for that compliance period that must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(7).

(c) You must demonstrate continuous compliance with each operating limit required by §63.4492 that applies to you, as specified in Table 1 to this subpart, when the coating line is in operation.

(1) If an operating parameter is out of the allowed range specified in Table 1 to this subpart, this is a deviation from the operating limit that must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(7).

(2) If an operating parameter deviates from the operating limit specified in Table 1 to this subpart, then you must assume that the emission capture system and add-on control device were achieving zero efficiency during the time period of the deviation, unless you have other data indicating the actual efficiency of the emission capture system and add-on control device and the use of these data is approved by the Administrator.

(d) You must meet the requirements for bypass lines in §63.4568(b) for controlled coating operations for which you do not conduct liquid-liquid material balances. If any bypass line is opened and emissions are diverted to the atmosphere when the coating operation is running, this is a deviation that must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(7). For the purposes of completing the compliance calculations specified in §§63.4561(h), you must treat the materials used during a deviation on a controlled coating operation as if they were used on an

uncontrolled coating operation for the time period of the deviation as indicated in Equation 1 of §63.4561.

(e) You must demonstrate continuous compliance with the work practice standards in §63.4493. If you did not develop a work practice plan, or you did not implement the plan, or you did not keep the records required by §63.4530(i)(8), this is a deviation from the work practice standards that must be reported as specified in §§63.4510(c)(6) and 63.4520(a)(7).

(f) As part of each semiannual compliance report required in §63.4520, you must identify the coating operation(s) for which you used the emission rate with add-on controls option. If there were no deviations from the emission limitations, submit a statement that you were in compliance with the emission limitations during the reporting period because the organic HAP emission rate for each compliance period was less than or equal to the applicable emission limit in §63.4490, and you achieved the operating limits required by §63.4492 and the work practice standards required by §63.4493 during each compliance period.

(g)–(i) [Reserved]

(j) You must maintain records as specified in §§63.4530 and 63.4531.

[69 FR 20990, Apr. 19, 2004, as amended at 71 FR 20465, Apr. 20, 2006]

§ 63.4564 What are the general requirements for performance tests?

(a) You must conduct each performance test required by §63.4560 according to the requirements in §63.7(e)(1) and under the conditions in this section, unless you obtain a waiver of the performance test according to the provisions in §63.7(h).

(1) *Representative coating operation operating conditions.* You must conduct the performance test under representative operating conditions for the coating operation. Operations during periods of startup, shutdown, or malfunction and during periods of nonoperation do not constitute representative conditions. You must record the process information that is necessary to document operating conditions during the test and explain why the conditions represent normal operation.

(2) *Representative emission capture system and add-on control device operating conditions.* You must conduct the performance test when the emission capture system and add-on control device are operating at a representative flow rate, and the add-on control device is operating at a representative inlet concentration. You must record information that is necessary to document emission capture system and add-on control device operating conditions during the test and explain why the conditions represent normal operation.

(b) You must conduct each performance test of an emission capture system according to the requirements in §63.4565. You must conduct each performance test of an add-on control device according to the requirements in §63.4566.

§ 63.4565 How do I determine the emission capture system efficiency?

You must use the procedures and test methods in this section to determine capture efficiency as part of the performance test required by §63.4560.

(a) *Assuming 100 percent capture efficiency.* You may assume the capture system efficiency is 100 percent if both of the conditions in paragraphs (a)(1) and (2) of this section are met:

(1) The capture system meets the criteria in Method 204 of appendix M to 40 CFR part 51 for a PTE and directs all the exhaust gases from the enclosure to an add-on control device.

(2) All coatings, thinners and/or other additives, and cleaning materials used in the coating operation are applied within the capture system; coating solvent flash-off, curing, and

drying occurs within the capture system; and the removal or evaporation of cleaning materials from the surfaces they are applied to occurs within the capture system. For example, this criterion is not met if parts enter the open shop environment when being moved between a spray booth and a curing oven.

(b) *Measuring capture efficiency.* If the capture system does not meet both of the criteria in paragraphs (a)(1) and (2) of this section, then you must use one of the three protocols described in paragraphs (c), (d), and (e) of this section to measure capture efficiency. The capture efficiency measurements use TVH capture efficiency as a surrogate for organic HAP capture efficiency. For the protocols in paragraphs (c) and (d) of this section, the capture efficiency measurement must consist of three test runs. Each test run must be at least 3 hours duration or the length of a production run, whichever is longer, up to 8 hours. For the purposes of this test, a production run means the time required for a single part to go from the beginning to the end of the production, which includes surface preparation activities and drying and curing time.

(c) *Liquid-to-uncaptured-gas protocol using a temporary total enclosure or building enclosure.* The liquid-to-uncaptured-gas protocol compares the mass of liquid TVH in materials used in the coating operation to the mass of TVH emissions not captured by the emission capture system. Use a temporary total enclosure or a building enclosure and the procedures in paragraphs (c)(1) through (6) of this section to measure emission capture system efficiency using the liquid-to-uncaptured-gas protocol.

(1) Either use a building enclosure or construct an enclosure around the coating operation where coatings, thinners and/or other additives, and cleaning materials are applied, and all areas where emissions from these applied coatings and materials subsequently occur, such as flash-off, curing, and drying areas. The areas of the coating operation where capture devices collect emissions for routing to an add-on control device, such as the entrance and exit areas of an oven or spray booth, must also be inside the enclosure. The enclosure must meet the applicable definition of a temporary total enclosure or building enclosure in Method 204 of appendix M to 40 CFR part 51.

(2) Use Method 204A or 204F of appendix M to 40 CFR part 51 to determine the mass fraction of TVH liquid input from each coating, thinner and/or other additive, and cleaning material used in the coating operation during each capture efficiency test run. To make the determination, substitute TVH for each occurrence of the term volatile organic compounds (VOC) in the methods.

(3) Use Equation 1 of this section to calculate the total mass of TVH liquid input from all the coatings, thinners and/or other additives, and cleaning materials used in the coating operation during each capture efficiency test run:

$$TVH_{used} = \sum_{i=1}^{n} (TVH_i)(Vol_i)(D_i) \quad (Eq.\ 1)$$

Where:

TVH_{used}= Mass of liquid TVH in materials used in the coating operation during the capture efficiency test run, kg.

TVH_i= Mass fraction of TVH in coating, thinner and/or other additive, or cleaning material, i, that is used in the coating operation during the capture efficiency test run, kg TVH per kg material.

Vol_i= Total volume of coating, thinner and/or other additive, or cleaning material, i, used in the coating operation during the capture efficiency test run, liters.

D_i= Density of coating, thinner and/or other additive, or cleaning material, i, kg material per liter material.

n = Number of different coatings, thinners and/or other additives, and cleaning materials used in the coating operation during the capture efficiency test run.

(4) Use Method 204D or 204E of appendix M to 40 CFR part 51 to measure the total mass, kg, of TVH emissions that are not captured by the emission capture system. They are measured as they exit the temporary total enclosure or building enclosure during each capture efficiency test run. To make the measurement, substitute TVH for each occurrence of the term VOC in the methods.

(i) Use Method 204D of appendix M to 40 CFR part 51 if the enclosure is a temporary total enclosure.

(ii) Use Method 204E of appendix M to 40 CFR 51 if the enclosure is a building enclosure. During the capture efficiency measurement, all organic compound emitting operations inside the building enclosure, other than the coating operation for which capture efficiency is being determined, must be shut down, but all fans and blowers must be operating normally.

(5) For each capture efficiency test run, determine the percent capture efficiency of the emission capture system using Equation 2 of this section:

$$CE = \frac{\left(TVH_{used} - TVH_{uncaptured}\right)}{TVH_{used}} \times 100 \qquad (Eq.\ 2)$$

Where:

CE = Capture efficiency of the emission capture system vented to the add-on control device, percent.

TVH_{used}= Total mass of TVH liquid input used in the coating operation during the capture efficiency test run, kg.

$TVH_{uncaptured}$= Total mass of TVH that is not captured by the emission capture system and that exits from the temporary total enclosure or building enclosure during the capture efficiency test run, kg.

(6) Determine the capture efficiency of the emission capture system as the average of the capture efficiencies measured in the three test runs.

(d) *Gas-to-gas protocol using a temporary total enclosure or a building enclosure.* The gas-to-gas protocol compares the mass of TVH emissions captured by the emission capture system to the mass of TVH emissions not captured. Use a temporary total enclosure or a building enclosure and the procedures in paragraphs (d)(1) through (5) of this section to measure emission capture system efficiency using the gas-to-gas protocol.

(1) Either use a building enclosure or construct an enclosure around the coating operation where coatings, thinners and/or other additives, and cleaning materials are applied, and all areas where emissions from these applied coatings and materials subsequently occur, such as flash-off, curing, and drying areas. The areas of the coating operation where capture devices collect emissions generated by the coating operation for routing to an add-on control device, such as the entrance and exit areas of an oven or a spray booth,

must also be inside the enclosure. The enclosure must meet the applicable definition of a temporary total enclosure or building enclosure in Method 204 of appendix M to 40 CFR part 51.

(2) Use Method 204B or 204C of appendix M to 40 CFR part 51 to measure the total mass, kg, of TVH emissions captured by the emission capture system during each capture efficiency test run as measured at the inlet to the add-on control device. To make the measurement, substitute TVH for each occurrence of the term VOC in the methods.

(i) The sampling points for the Method 204B or 204C measurement must be upstream from the add-on control device and must represent total emissions routed from the capture system and entering the add-on control device.

(ii) If multiple emission streams from the capture system enter the add-on control device without a single common duct, then the emissions entering the add-on control device must be simultaneously measured in each duct and the total emissions entering the add-on control device must be determined.

(3) Use Method 204D or 204E of appendix M to 40 CFR part 51 to measure the total mass, kg, of TVH emissions that are not captured by the emission capture system; they are measured as they exit the temporary total enclosure or building enclosure during each capture efficiency test run. To make the measurement, substitute TVH for each occurrence of the term VOC in the methods.

(i) Use Method 204D of appendix M to 40 CFR part 51 if the enclosure is a temporary total enclosure.

(ii) Use Method 204E of appendix M to 40 CFR part 51 if the enclosure is a building enclosure. During the capture efficiency measurement, all organic compound emitting operations inside the building enclosure, other than the coating operation for which capture efficiency is being determined, must be shut down, but all fans and blowers must be operating normally.

(4) For each capture efficiency test run, determine the percent capture efficiency of the emission capture system using Equation 3 of this section:

$$CE = \frac{TVH_{captured}}{\left(TVH_{captured} + TVH_{uncaptured}\right)} \times 100 \qquad (Eq.\ 3)$$

Where:

CE = Capture efficiency of the emission capture system vented to the add-on control device, percent.

$TVH_{captured}$= Total mass of TVH captured by the emission capture system as measured at the inlet to the add-on control device during the emission capture efficiency test run, kg.

$TVH_{uncaptured}$= Total mass of TVH that is not captured by the emission capture system and that exits from the temporary total enclosure or building enclosure during the capture efficiency test run, kg.

(5) Determine the capture efficiency of the emission capture system as the average of the capture efficiencies measured in the three test runs.

(e) *Alternative capture efficiency protocol.* As an alternative to the procedures specified in paragraphs (c) and (d) of this section and subject to the approval of the Administrator, you may determine capture efficiency using any other capture efficiency protocol and test methods that

satisfy the criteria of either the DQO or LCL approach as described in appendix A to subpart KK of this part.

§ 63.4566 How do I determine the add-on control device emission destruction or removal efficiency?

You must use the procedures and test methods in this section to determine the add-on control device emission destruction or removal efficiency as part of the performance test required by §63.4560. You must conduct three test runs as specified in §63.7(e)(3) and each test run must last at least 1 hour.

(a) For all types of add-on control devices, use the test methods specified in paragraphs (a)(1) through (5) of this section.

(1) Use Method 1 or 1A of appendix A to 40 CFR part 60, as appropriate, to select sampling sites and velocity traverse points.

(2) Use Method 2, 2A, 2C, 2D, 2F, or 2G of appendix A to 40 CFR part 60, as appropriate, to measure gas volumetric flow rate.

(3) Use Method 3, 3A, or 3B of appendix A to 40 CFR part 60, as appropriate, for gas analysis to determine dry molecular weight.

(4) Use Method 4 of appendix A to 40 CFR part 60, to determine stack gas moisture.

(5) Methods for determining gas volumetric flow rate, dry molecular weight, and stack gas moisture must be performed, as applicable, during each test run.

(b) Measure total gaseous organic mass emissions as carbon at the inlet and outlet of the add-on control device simultaneously, using either Method 25 or 25A of appendix A to 40 CFR part 60.

(1) Use Method 25 if the add-on control device is an oxidizer and you expect the total gaseous organic concentration as carbon to be more than 50 parts per million (ppm) at the control device outlet.

(2) Use Method 25A if the add-on control device is an oxidizer and you expect the total gaseous organic concentration as carbon to be 50 ppm or less at the control device outlet.

(3) Use Method 25A if the add-on control device is not an oxidizer.

(c) If two or more add-on control devices are used for the same emission stream, then you must measure emissions at the outlet to the atmosphere of each device. For example, if one add-on control device is a concentrator with an outlet to the atmosphere for the high-volume dilute stream that has been treated by the concentrator, and a second add-on control device is an oxidizer with an outlet to the atmosphere for the low-volume concentrated stream that is treated with the oxidizer, you must measure emissions at the outlet of the oxidizer and the high volume dilute stream outlet of the concentrator.

(d) For each test run, determine the total gaseous organic emissions mass flow rates for the inlet and the outlet of the add-on control device, using Equation 1 of this section. If there is more than one inlet or outlet to the add-on control device, you must calculate the total gaseous organic mass flow rate using Equation 1 of this section for each inlet and each outlet and then total all of the inlet emissions and total all of the outlet emissions:

$$M_f = Q_{sd} C_c (12)(0.0416)(10^{-6}) \quad (Eq.\ 1)$$

Where:

M_f= Total gaseous organic emissions mass flow rate, kg/per hour (h).

C_c= Concentration of organic compounds as carbon in the vent gas, as determined by Method 25 or Method 25A, parts per million by volume (ppmv), dry basis.

Q_{sd}= Volumetric flow rate of gases entering or exiting the add-on control device, as determined by Method 2, 2A, 2C, 2D, 2F, or 2G, dry standard cubic meters/hour (dscm/h).

0.0416 = Conversion factor for molar volume, kg-moles per cubic meter (mol/m^3) (@ 293 Kelvin (K) and 760 millimeters of mercury (mmHg)).

(e) For each test run, determine the add-on control device organic emissions destruction or removal efficiency, using Equation 2 of this section:

$$DRE = \frac{M_{fi} - M_{fo}}{M_{fi}} \times 100 \qquad (Eq.\ 2)$$

Where:

DRE = Organic emissions destruction or removal efficiency of the add-on control device, percent.

M_{fi}= Total gaseous organic emissions mass flow rate at the inlet(s) to the add-on control device, using Equation 1 of this section, kg/h.

M_{fo}= Total gaseous organic emissions mass flow rate at the outlet(s) of the add-on control device, using Equation 1 of this section, kg/h.

(f) Determine the emission destruction or removal efficiency of the add-on control device as the average of the efficiencies determined in the three test runs and calculated in Equation 2 of this section.

§ 63.4567 How do I establish the emission capture system and add-on control device operating limits during the performance test?

During the performance test required by §63.4560 and described in §§63.4564, 63.4565, and 63.4566, you must establish the operating limits required by §63.4492 according to this section, unless you have received approval for alternative monitoring and operating limits under §63.8(f) as specified in §63.4492.

(a) *Thermal oxidizers.* If your add-on control device is a thermal oxidizer, establish the operating limits according to paragraphs (a)(1) and (2) of this section.

(1) During the performance test, you must monitor and record the combustion temperature at least once every 15 minutes during each of the three test runs. You must monitor the temperature in the firebox of the thermal oxidizer or immediately downstream of the firebox before any substantial heat exchange occurs.

(2) Use the data collected during the performance test to calculate and record the average combustion temperature maintained during the performance test. This average combustion temperature is the minimum operating limit for your thermal oxidizer.

(b) *Catalytic oxidizers.* If your add-on control device is a catalytic oxidizer, establish the operating limits according to either paragraphs (b)(1) and (2) or paragraphs (b)(3) and (4) of this section.

(1) During the performance test, you must monitor and record the temperature just before the catalyst bed and the temperature difference across the catalyst bed at least once every 15 minutes during each of the three test runs.

(2) Use the data collected during the performance test to calculate and record the average temperature just before the catalyst bed and the average temperature difference across the catalyst bed maintained during the performance test. These are the minimum operating limits for your catalytic oxidizer.

(3) You must monitor the temperature at the inlet to the catalyst bed and implement a site-specific inspection and maintenance plan for your catalytic oxidizer as specified in paragraph (b)(4) of this section. During the performance test, you must monitor and record the temperature just before the catalyst bed at least once every 15 minutes during each of the three test runs. Use the data collected during the performance test to calculate and record the average temperature just before the catalyst bed during the performance test. This is the minimum operating limit for your catalytic oxidizer.

(4) You must develop and implement an inspection and maintenance plan for your catalytic oxidizer(s) for which you elect to monitor according to paragraph (b)(3) of this section. The plan must address, at a minimum, the elements specified in paragraphs (b)(4)(i) through (iii) of this section.

(i) Annual sampling and analysis of the catalyst activity (*i.e.,* conversion efficiency) following the manufacturer's or catalyst supplier's recommended procedures. If problems are found during the catalyst activity test, you must replace the catalyst bed or take other corrective action consistent with the manufacturer's recommendations.

(ii) Monthly external inspection of the catalytic oxidizer system, including the burner assembly and fuel supply lines for problems and, as necessary, adjust the equipment to assure proper air-to-fuel mixtures.

(iii) Annual internal inspection of the catalyst bed to check for channeling, abrasion, and settling. If problems are found during the annual internal inspection of the catalyst, you must replace the catalyst bed or take other corrective action consistent with the manufacturer's recommendations. If the catalyst bed is replaced and is not of like or better kind and quality as the old catalyst then you must conduct a new performance test to determine destruction efficiency according to §63.4566. If a catalyst bed is replaced and the replacement catalyst is of like or better kind and quality as the old catalyst, then a new performance test to determine destruction efficiency is not required and you may continue to use the previously established operating limits for that catalytic oxidizer.

(c) *Regenerative carbon adsorbers.* If your add-on control device is a regenerative carbon adsorber, establish the operating limits according to paragraphs (c)(1) and (2) of this section.

(1) You must monitor and record the total regeneration desorbing gas (*e.g.,* steam or nitrogen) mass flow for each regeneration cycle, and the carbon bed temperature after each carbon bed regeneration and cooling cycle for the regeneration cycle either immediately preceding or immediately following the performance test.

(2) The operating limits for your regenerative carbon adsorber are the minimum total desorbing gas mass flow recorded during the regeneration cycle and the maximum carbon bed temperature recorded after the cooling cycle.

(d) *Condensers.* If your add-on control device is a condenser, establish the operating limits according to paragraphs (d)(1) and (2) of this section.

(1) During the performance test, you must monitor and record the condenser outlet (product side) gas temperature at least once every 15 minutes during each of the three test runs.

(2) Use the data collected during the performance test to calculate and record the average condenser outlet (product side) gas temperature maintained during the performance test. This average condenser outlet gas temperature is the maximum operating limit for your condenser.

(e) *Concentrators.* If your add-on control device includes a concentrator, you must establish operating limits for the concentrator according to paragraphs (e)(1) through (4) of this section.

(1) During the performance test, you must monitor and record the desorption concentrate stream gas temperature at least once every 15 minutes during each of the three runs of the performance test.

(2) Use the data collected during the performance test to calculate and record the average temperature. This is the minimum operating limit for the desorption concentrate gas stream temperature.

(3) During the performance test, you must monitor and record the pressure drop of the dilute stream across the concentrator at least once every 15 minutes during each of the three runs of the performance test.

(4) Use the data collected during the performance test to calculate and record the average pressure drop. This is the minimum operating limit for the dilute stream across the concentrator.

(f) *Emission capture systems.* For each capture device that is not part of a PTE that meets the criteria of §63.4565(a), establish an operating limit for either the gas volumetric flow rate or duct static pressure, as specified in paragraphs (f)(1) and (2) of this section. The operating limit for a PTE is specified in Table 1 to this subpart.

(1) During the capture efficiency determination required by §63.4560 and described in §§63.4564 and 63.4565, you must monitor and record either the gas volumetric flow rate or the duct static pressure for each separate capture device in your emission capture system at least once every 15 minutes during each of the three test runs at a point in the duct between the capture device and the add-on control device inlet.

(2) Calculate and record the average gas volumetric flow rate or duct static pressure for the three test runs for each capture device. This average gas volumetric flow rate or duct static pressure is the minimum operating limit for that specific capture device.

§ 63.4568 What are the requirements for continuous parameter monitoring system installation, operation, and maintenance?

(a) *General.* You must install, operate, and maintain each CPMS specified in paragraphs (c), (e), (f), and (g) of this section according to paragraphs (a)(1) through (6) of this section. You must install, operate, and maintain each CPMS specified in paragraphs (b) and (d) of this section according to paragraphs (a)(3) through (5) of this section.

(1) The CPMS must complete a minimum of one cycle of operation for each successive 15-minute period. You must have a minimum of four equally spaced successive cycles of CPMS operation in 1 hour.

(2) You must determine the average of all recorded readings for each successive 3-hour period of the emission capture system and add-on control device operation.

(3) You must record the results of each inspection, calibration, and validation check of the CPMS.

(4) You must maintain the CPMS at all times and have available necessary parts for routine repairs of the monitoring equipment.

(5) You must operate the CPMS and collect emission capture system and add-on control device parameter data at all times that a controlled coating operation is operating, except during monitoring malfunctions, associated repairs, and required quality assurance or control activities (including, if applicable, calibration checks and required zero and span adjustments).

(6) You must not use emission capture system or add-on control device parameter data recorded during monitoring malfunctions, associated repairs, out-of-control periods, or required quality assurance or control activities when calculating data averages. You must use all the data collected during all other periods in calculating the data averages for determining compliance with the emission capture system and add-on control device operating limits.

(7) A monitoring malfunction is any sudden, infrequent, not reasonably preventable failure of the CPMS to provide valid data. Monitoring failures that are caused in part by poor maintenance or careless operation are not malfunctions. Any period for which the monitoring system is out-of-control and data are not available for required calculations is a deviation from the monitoring requirements.

(b) *Capture system bypass line.* You must meet the requirements of paragraphs (b)(1) and (2) of this section for each emission capture system that contains bypass lines that could divert emissions away from the add-on control device to the atmosphere.

(1) You must monitor or secure the valve or closure mechanism controlling the bypass line in a nondiverting position in such a way that the valve or closure mechanism cannot be opened without creating a record that the valve was opened. The method used to monitor or secure the valve or closure mechanism must meet one of the requirements specified in paragraphs (b)(1)(i) through (v) of this section.

(i) *Flow control position indicator.* Install, calibrate, maintain, and operate according to the manufacturer's specifications a flow control position indicator that takes a reading at least once every 15 minutes and provides a record indicating whether the emissions are directed to the add-on control device or diverted from the add-on control device. The time of occurrence and flow control position must be recorded, as well as every time the flow direction is changed. The flow control position indicator must be installed at the entrance to any bypass line that could divert the emissions away from the add-on control device to the atmosphere.

(ii) *Car-seal or lock-and-key valve closures.* Secure any bypass line valve in the closed position with a car-seal or a lock-and-key type configuration. You must visually inspect the seal or closure mechanism at least once every month to ensure that the valve is maintained in the closed position, and the emissions are not diverted away from the add-on control device to the atmosphere.

(iii) *Valve closure monitoring.* Ensure that any bypass line valve is in the closed (nondiverting) position through monitoring of valve position at least once every 15 minutes. You must inspect the monitoring system at least once every month to verify that the monitor will indicate valve position.

(iv) *Automatic shutdown system.* Use an automatic shutdown system in which the coating operation is *stopped* when flow is diverted by the bypass line away from the add-on control device to the atmosphere when the coating operation is running. You must inspect the automatic shutdown system at least once every month to verify that it will detect diversions of flow and shut down the coating operation.

(v) *Flow direction indicator.* Install, calibrate, maintain, and operate according to the manufacturer's *specifications* a flow direction indicator that takes a reading at

least once every 15 minutes and provides a record indicating whether the emissions are directed to the add-on control device or diverted from the add-on control device. Each time the flow direction changes, the next reading of the time of occurrence and flow direction must be recorded. The flow direction indicator must be installed in each bypass line or air makeup supply line that could divert the emissions away from the add-on control device to the atmosphere.

(2) If any bypass line is opened, you must include a description of why the bypass line was opened and the length of time it remained open in the semiannual compliance reports required in §63.4520.

(c) *Thermal oxidizers and catalytic oxidizers.* If you are using a thermal oxidizer or catalytic oxidizer as an add-on control device (including those used with concentrators or with carbon adsorbers to treat desorbed concentrate streams), you must comply with the requirements in paragraphs (c)(1) through (3) of this section:

(1) For a thermal oxidizer, install a gas temperature monitor in the firebox of the thermal oxidizer or in the duct immediately downstream of the firebox before any substantial heat exchange occurs.

(2) For a catalytic oxidizer, install gas temperature monitors upstream and/or downstream of the catalyst bed as required in §63.3967(b).

(3) For all thermal oxidizers and catalytic oxidizers, you must meet the requirements in paragraphs (a) and (c)(3)(i) through (v) of this section for each gas temperature monitoring device.

(i) Locate the temperature sensor in a position that provides a representative temperature.

(ii) Use a temperature sensor with a measurement sensitivity of 5 degrees Fahrenheit or 1.0 percent of the temperature value, whichever is larger.

(iii) Before using the sensor for the first time or when relocating or replacing the sensor, perform a validation check by comparing the sensor output to a calibrated temperature measurement device or by comparing the sensor output to a simulated temperature.

(iv) Conduct an accuracy audit every quarter and after every deviation. Accuracy audit methods include comparisons of sensor output to redundant temperature sensors, to calibrated temperature measurement devices, or to temperature simulation devices.

(v) Conduct a visual inspection of each sensor every quarter if redundant temperature sensors are not used.

(d) *Regenerative carbon adsorbers.* If you are using a regenerative carbon adsorber as an add-on control device, you must monitor the total regeneration desorbing gas (*e.g.,* steam or nitrogen) mass flow for each regeneration cycle, the carbon bed temperature after each regeneration and cooling cycle, and comply with paragraphs (a)(3) through (5) and (d)(1) through (3) of this section.

(1) The regeneration desorbing gas mass flow monitor must be an integrating device having a measurement sensitivity of plus or minus 10 percent capable of recording the total regeneration desorbing gas mass flow for each regeneration cycle.

(2) The carbon bed temperature monitor must be capable of recording the temperature within 15 minutes of completing any carbon bed cooling cycle.

(3) For all regenerative carbon adsorbers, you must meet the requirements in paragraphs

(c)(3)(i) through (v) of this section for each temperature monitoring device.

(e) *Condensers.* If you are using a condenser, you must monitor the condenser outlet (product side) gas temperature and comply with paragraphs (a) and (e)(1) and (2) of this section.

(1) The temperature monitor must provide a gas temperature record at least once every 15 minutes.

(2) For all condensers, you must meet the requirements in paragraphs (c)(3)(i) through (v) of this section for each temperature monitoring device.

(f) *Concentrators.* If you are using a concentrator, such as a zeolite wheel or rotary carbon bed concentrator, you must comply with the requirements in paragraphs (f)(1) and (2) of this section.

(1) You must install a temperature monitor in the desorption gas stream. The temperature monitor must meet the requirements in paragraphs (a) and (c)(3) of this section.

(2) You must install a device to monitor pressure drop across the zeolite wheel or rotary carbon bed. The pressure monitoring device must meet the requirements in paragraphs (a) and (g)(2) of this section.

(g) *Emission capture systems.* The capture system monitoring system must comply with the applicable requirements in paragraphs (g)(1) and (2) of this section.

(1) For each flow measurement device, you must meet the requirements in paragraphs (a) and (g)(1)(i) through (vii) of this section.

(i) Locate a flow sensor in a position that provides a representative flow measurement in the duct from each capture device in the emission capture system to the add-on control device.

(ii) Use a flow sensor with an accuracy of at least 10 percent of the flow.

(iii) Perform an initial sensor calibration in accordance with the manufacturer's requirements.

(iv) Perform a validation check before initial use or upon relocation or replacement of a sensor. Validation checks include comparison of sensor values with electronic signal simulations or via relative accuracy testing.

(v) Conduct an accuracy audit every quarter and after every deviation. Accuracy audit methods include comparisons of sensor values with electronic signal simulations or via relative accuracy testing.

(vi) Perform leak checks monthly.

(vii) Perform visual inspections of the sensor system quarterly if there is no redundant sensor.

(2) For each pressure drop measurement device, you must comply with the requirements in paragraphs (a) and (g)(2)(i) through (vii) of this section.

(i) Locate the pressure sensor(s) in or as close to a position that provides a representative measurement of the pressure drop across each opening you are monitoring.

(ii) Use a pressure sensor with an accuracy of at least 0.5 inches of water column or 5 percent of the measured value, whichever is larger.

(iii) Perform an initial calibration of the sensor according to the manufacturer's requirements.

(iv) Conduct a validation check before initial operation or upon relocation or replacement of a sensor. Validation checks include comparison of sensor values to calibrated pressure measurement devices or to pressure simulation using calibrated pressure sources.

(v) Conduct accuracy audits every quarter and after every deviation. Accuracy audits include comparison of sensor values to calibrated pressure measurement devices or to pressure simulation using calibrated pressure sources.

(vi) Perform monthly leak checks on pressure connections. A pressure of at least 1.0 inches of water column to the connection must yield a stable sensor result for at least 15 seconds.

(vii) Perform a visual inspection of the sensor at least monthly if there is no redundant sensor.

Other Requirements and Information

§ 63.4580 Who implements and enforces this subpart?

(a) This subpart can be implemented and enforced by us, the U.S. Environmental Protection Agency (EPA), or a delegated authority such as your State, local, or tribal agency. If the Administrator has delegated authority to your State, local, or tribal agency, then that agency (as well as the EPA) has the authority to implement and enforce this subpart. You should contact your EPA Regional Office to find out if implementation and enforcement of this subpart is delegated to your State, local, or tribal agency.

(b) In delegating implementation and enforcement authority of this subpart to a State, local, or tribal agency under subpart E of this part, the authorities contained in paragraph (c) of this section are retained by the Administrator and are not transferred to the State, local, or tribal agency.

(c) The authorities that will not be delegated to State, local, or tribal agencies are listed in paragraphs (c)(1) through (4) of this section:

(1) Approval of alternatives to the requirements in §§63.4481 through 4483 and §§63.4490 through 4493.

(2) Approval of major alternatives to test methods under §63.7(e)(2)(ii) and (f) and as defined in §63.90.

(3) Approval of major alternatives to monitoring under §63.8(f) and as defined in §63.90.

(4) Approval of major alternatives to recordkeeping and reporting under §63.10(f) and as defined in §63.90.

§ 63.4581 What definitions apply to this subpart?

Terms used in this subpart are defined in the CAA, in 40 CFR 63.2, and in this section as follows:

Additive means a material that is added to a coating after purchase from a supplier (e.g., catalysts, activators, accelerators).

Add-on control means an air pollution control device, such as a thermal oxidizer or carbon adsorber, that reduces pollution in an air stream by destruction or removal before discharge to the atmosphere.

Adhesive, adhesive coating means any chemical substance that is applied for the purpose of bonding two surfaces together. Products used on humans and animals, adhesive tape, contact paper, or any other product with an adhesive incorporated onto or in an inert substrate shall not be considered adhesives under this subpart.

Assembled on-road vehicle coating means any coating operation in which coating is applied to the surface of some component or surface of a fully assembled motor vehicle or trailer intended for on-road use including, but not limited to, components or surfaces on automobiles and light-duty trucks that have been repaired after a collision or otherwise repainted, fleet delivery trucks, and motor homes and other recreational vehicles (including camping trailers and fifth wheels). Assembled on-road vehicle coating includes the concurrent coating of parts of the assembled on-road vehicle that are painted off-vehicle to protect systems, equipment, or to allow full coverage. Assembled on-road vehicle coating does not include surface coating operations that meet the applicability criteria of the Automobiles and Light-Duty Trucks NESHAP. Assembled on-road vehicle coating also does not include the use of adhesives, sealants, and caulks used in assembling on-road vehicles.

Automotive lamp coating means any coating operation in which coating is applied to the surface of some component of the body of an exterior automotive lamp, including the application of reflective argent coatings and clear topcoats. Exterior automotive lamps include head lamps, tail lamps, turn signals, brake lights, and side marker lights. Automotive lamp coating does not include any coating operation performed on an assembled on-road vehicle.

Capture device means a hood, enclosure, room, floor sweep, or other means of containing or collecting emissions and directing those emissions into an add-on air pollution control device.

Capture efficiency or capture system efficiency means the portion (expressed as a percentage) of the pollutants from an emission source that is delivered to an add-on control device.

Capture system means one or more capture devices intended to collect emissions generated by a coating operation in the use of coatings or cleaning materials, both at the point of application and at subsequent points where emissions from the coatings and cleaning materials occur, such as flashoff, drying, or curing. As used in this subpart, multiple capture devices that collect emissions generated by a coating operation are considered a single capture system.

Cleaning material means a solvent used to remove contaminants and other materials, such as dirt, grease, oil, and dried or wet coating (*e.g.,* depainting), from a substrate before or after coating application or from equipment associated with a coating operation, such as spray booths, spray guns, racks, tanks, and hangers. Thus, it includes any cleaning material used on substrates or equipment or both.

Coating means a material applied to a substrate for decorative, protective, or functional purposes. Such materials include, but are not limited to, paints, sealants, liquid plastic coatings, caulks, inks, adhesives, and maskants. Decorative, protective, or functional materials that consist only of protective oils for metal, acids, bases, or any combination of these substances, or paper film or plastic film which may be pre-coated with an adhesive by the film manufacturer, are not considered coatings for the purposes of this subpart. A liquid plastic coating means a coating made from fine particle-size polyvinyl chloride (PVC) in solution (also referred to as a plastisol).

Coating operation means equipment used to apply cleaning materials to a substrate to prepare it for

coating application (surface preparation) or to remove dried coating; to apply coating to a substrate (coating application) and to dry or cure the coating after application; or to clean coating operation equipment (equipment cleaning). A single coating operation may include any combination of these types of equipment, but always includes at least the point at which a given quantity of coating or cleaning material is applied to a given part and all subsequent points in the affected source where organic HAP are emitted from the specific quantity of coating or cleaning material on the specific part. There may be multiple coating operations in an affected source. Coating application with handheld, non-refillable aerosol containers, touch-up markers, or marking pens is not a coating operation for the purposes of this subpart.

Coatings solids means the nonvolatile portion of the coating that makes up the dry film.

Continuous parameter monitoring system (CPMS) means the total equipment that may be required to meet the data acquisition and availability requirements of this subpart, used to sample, condition (if applicable), analyze, and provide a record of coating operation, or capture system, or add-on control device parameters.

Controlled coating operation means a coating operation from which some or all of the organic HAP emissions are routed through an emission capture system and add-on control device.

Deviation means any instance in which an affected source subject to this subpart, or an owner or operator of such a source:

(1) Fails to meet any requirement or obligation established by this subpart including but not limited to, any emission limit or operating limit or work practice standard;

(2) Fails to meet any term or condition that is adopted to implement an applicable requirement in this subpart and that is included in the operating permit for any affected source required to obtain such a permit; or

(3) Fails to meet any emission limit, or operating limit, or work practice standard in this subpart during startup, shutdown, or malfunction, regardless of whether or not such failure is permitted by this subpart.

Emission limitation means the aggregate of all requirements associated with a compliance option including emission limit, operating limit, work practice standard, etc.

Enclosure means a structure that surrounds a source of emissions and captures and directs the emissions to an add-on control device.

Exempt compound means a specific compound that is not considered a VOC due to negligible photochemical reactivity. The exempt compounds are listed in 40 CFR 51.100(s).

Facility maintenance means the routine repair or renovation (including the surface coating) of the tools, equipment, machinery, and structures that comprise the infrastructure of the affected facility and that are necessary for the facility to function in its intended capacity.

General use coating means any coating operation that is not an automotive lamp, TPO, or assembled on-road vehicle coating operation.

Hobby shop means any surface coating operation, located at an affected source, that is used exclusively for personal, noncommercial purposes by the affected source's employees or assigned personnel.

Manufacturer's formulation data means data on a material (such as a coating) that are supplied by the material manufacturer based on knowledge of the ingredients used to manufacture that material, rather than based on testing of the material with the test methods specified in §63.4541. Manufacturer's

formulation data may include, but are not limited to, information on density, organic HAP content, volatile organic matter content, and coating solids content.

Mass fraction of coating solids means the ratio of the mass of solids (also known as the mass of nonvolatiles) to the mass of a coating in which it is contained; kg of coating solids per kg of coating.

Mass fraction of organic HAP means the ratio of the mass of organic HAP to the mass of a material in which it is contained, expressed as kg of organic HAP per kg of material.

Month means a calendar month or a pre-specified period of 28 days to 35 days to allow for flexibility in recordkeeping when data are based on a business accounting period.

Non-HAP coating means, for the purposes of this subpart, a coating that contains no more than 0.1 percent by mass of any individual organic HAP that is an OSHA-defined carcinogen as specified in 29 CFR 1910.1200(d)(4) and no more than 1.0 percent by mass for any other individual HAP.

Organic HAP content means the mass of organic HAP emitted per mass of coating solids used for a coating calculated using Equation 1 of §63.4541. The organic HAP content is determined for the coating in the condition it is in when received from its manufacturer or supplier and does not account for any alteration after receipt. For reactive adhesives in which some of the HAP react to form solids and are not emitted to the atmosphere, organic HAP content is the mass of organic HAP that is emitted, rather than the organic HAP content of the coating as it is received.

Permanent total enclosure (PTE) means a permanently installed enclosure that meets the criteria of Method 204 of appendix M, 40 CFR part 51, for a PTE and that directs all the exhaust gases from the enclosure to an add-on control device.

Personal watercraft means a vessel (boat) which uses an inboard motor powering a water jet pump as its primary source of motive power and which is designed to be operated by a person or persons sitting, standing, or kneeling on the vessel, rather than in the conventional manner of sitting or standing inside the vessel.

Plastic part and product means any piece or combination of pieces of which at least one has been formed from one or more resins. Such pieces may be solid, porous, flexible or rigid.

Protective oil means an organic material that is applied to metal for the purpose of providing lubrication or protection from corrosion without forming a solid film. This definition of protective oil includes, but is not limited to, lubricating oils, evaporative oils (including those that evaporate completely), and extrusion oils.

Reactive adhesive means adhesive systems composed, in part, of volatile monomers that react during the adhesive curing reaction, and, as a result, do not evolve from the film during use. These volatile components instead become integral parts of the adhesive through chemical reaction. At least 70 percent of the liquid components of the system, excluding water, react during the process.

Research or laboratory facility means a facility whose primary purpose is for research and development of new processes and products, that is conducted under the close supervision of technically trained personnel, and is not engaged in the manufacture of final or intermediate products for commercial purposes, except in a *de minimis* manner.

Responsible official means responsible official as defined in 40 CFR 70.2.

Startup, initial means the first time equipment is brought online in a facility.

Surface preparation means use of a cleaning material on a portion of or all of a substrate. This includes use of a cleaning material to remove dried coating, which is sometimes called depainting.

Temporary total enclosure means an enclosure constructed for the purpose of measuring the capture efficiency of pollutants emitted from a given source as defined in Method 204 of appendix M, 40 CFR part 51.

Thermoplastic olefin (TPO) means polyolefins (blends of polypropylene, polyethylene and its copolymers). This also includes blends of TPO with polypropylene and polypropylene alloys including, but not limited to, thermoplastic elastomer (TPE), TPE polyurethane (TPU), TPE polyester (TPEE), TPE polyamide (TPAE), and thermoplastic elastomer polyvinyl chloride (TPVC).

Thermoplastic olefin (TPO) coating means any coating operation in which the coatings are components of a system of coatings applied to a TPO substrate, including adhesion promoters, primers, color coatings, clear coatings and topcoats. Thermoplastic olefin coating does not include the coating of TPO substrates on assembled on-road vehicles.

Thinner means an organic solvent that is added to a coating after the coating is received from the supplier.

Total volatile hydrocarbon (TVH) means the total amount of nonaqueous volatile organic matter determined according to Methods 204 and 204A through 204F of appendix M to 40 CFR part 51 and substituting the term TVH each place in the methods where the term VOC is used. The TVH includes both VOC and non-VOC.

Uncontrolled coating operation means a coating operation from which none of the organic HAP emissions are routed through an emission capture system and add-on control device.

Volatile organic compound (VOC) means any compound defined as VOC in 40 CFR 51.100(s).

Wastewater means water that is generated in a coating operation and is collected, stored, or treated prior to being discarded or discharged.

Table 1 to Subpart PPPP of Part 63—
Operating Limits if Using the Emission Rate With Add-On Controls Option

If you are required to comply with operating limits by §63.4491(c), you must comply with the applicable operating limits in the following table:

For the following device . . .	You must meet the following operating limit . . .	And you must demonstrate continuous compliance with the operating limit by . . .
1. Thermal oxidizer	a. The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to §63.4567(a).	i. Collecting the combustion temperature data according to §63.4568(c); ii. Reducing the data to 3-hour block averages; and iii. Maintaining the 3-hour average combustion temperature at or above the temperature limit.
2. Catalytic oxidizer	a. The average temperature measured just before the catalyst bed in any 3-hour period must not fall below the limit established according to §63.4567(b); and either	i. Collecting the temperature data according to §63.4568(c); ii. Reducing the data to 3-hour block averages; and iii. Maintaining the 3-hour average temperature before the catalyst bed at or above the temperature limit.
	b. Ensure that the average temperature difference across the catalyst bed in any 3-hour period does not fall below the	i. Collecting the temperature data according to §63.4568(c); ii. Reducing the data to 3-hour block averages; and

For the following device . . .	You must meet the following operating limit . . .	And you must demonstrate continuous compliance with the operating limit by . . .
	temperature difference limit established according to §63.4567(b)(2); or	iii. Maintaining the 3-hour average temperature difference at or above the temperature difference limit.
	c. Develop and implement an inspection and maintenance plan according to §63.4567(b)(4).	i. Maintaining an up-to-date inspection and maintenance plan, records of annual catalyst activity checks, records of monthly inspections of the oxidizer system, and records of the annual internal inspections of the catalyst bed. If a problem is discovered during a monthly or annual inspection required by §63.4567(b)(4), you must take corrective action as soon as practicable consistent with the manufacturer's recommendations.
3. Regenerative carbon adsorber	a. The total regeneration desorbing gas (*e.g.,* steam or nitrogen) mass flow for each carbon bed regeneration cycle must not fall below the total regeneration desorbing gas mass flow limit established according to §63.4567(c); and	i. Measuring the total regeneration desorbing gas (*e.g.,* steam or nitrogen) mass flow for each regeneration cycle according to §63.4568(d); and ii. Maintaining the total regeneration desorbing gas mass flow at or above the mass flow limit.
	b. The temperature of the carbon bed, after completing each regeneration and any cooling cycle, must not exceed the carbon bed temperature limit established according to §63.4567(c).	i. Measuring the temperature of the carbon bed after completing each regeneration and any cooling cycle according to §63.4568(d); and ii. Operating the carbon beds such that each carbon bed is not returned to service until completing each regeneration and any cooling cycle until the recorded temperature of the carbon bed is at or below the temperature limit.
4. Condenser	a. The average condenser outlet (product side) gas temperature in any 3-hour period must not exceed the temperature limit established according to §63.4567(d).	i. Collecting the condenser outlet (product side) gas temperature according to §63.4568(e); ii. Reducing the data to 3-hour block averages; and iii. Maintaining the 3-hour average gas temperature at the outlet at or below the temperature limit.
5. Concentrators, including zeolite wheels and rotary carbon adsorbers	a. The average gas temperature of the desorption concentrate stream in any 3-hour period must not fall below the limit established according to §63.4567(e); and	i. Collecting the temperature data according to §63.4568(f); ii. Reducing the data to 3-hour block averages; and iii. Maintaining the 3-hour average temperature at or above the temperature limit.
	b. The average pressure drop of	i. Collecting the pressure drop data

For the following device . . .	You must meet the following operating limit . . .	And you must demonstrate continuous compliance with the operating limit by . . .
	the dilute stream across the concentrator in any 3-hour period must not fall below the limit established according to §63.4567(e).	according to §63.4568(f); ii. Reducing the pressure drop data to 3-hour block averages; and iii. Maintaining the 3-hour average pressure drop at or above the pressure drop limit.
6. Emission capture system that is a PTE according to §63.4565(a)	a. The direction of the air flow at all times must be into the enclosure; and either	i. Collecting the direction of air flow, and either the facial velocity of air through all natural draft openings according to §63.4568(g)(1) or the pressure drop across the enclosure according to §63.4568(g)(2); and ii. Maintaining the facial velocity of air flow through all natural draft openings or the pressure drop at or above the facial velocity limit or pressure drop limit, and maintaining the direction of air flow into the enclosure at all times.
	b. The average facial velocity of air through all natural draft openings in the enclosure must be at least 200 feet per minute; or	i. *See* items 6.a.i and 6.a.ii.
	c. The pressure drop across the enclosure must be at least 0.007 inch H_2O, as established in Method 204 of appendix M to 40 CFR part 51.	i. *See* items 6.a.i and 6.a.ii.
7. Emission capture system that is not a PTE according to §63.4565(a)	a. The average gas volumetric flow rate or duct static pressure in each duct between a capture device and add-on control device inlet in any 3-hour period must not fall below the average volumetric flow rate or duct static pressure limit established for that capture device according to §63.4567(f).	i. Collecting the gas volumetric flow rate or duct static pressure for each capture device according to §63.4568(g); ii. Reducing the data to 3-hour block averages; and iii. Maintaining the 3-hour average gas volumetric flow rate or duct static pressure for each capture device at or above the gas volumetric flow rate or duct static pressure limit.

Table 2 to Subpart PPPP of Part 63—
Applicability of General Provisions to Subpart PPPP of Part 63

You must comply with the applicable General Provisions requirements according to the following table

Citation	Subject	Applicable to subpart PPPP	Explanation
§63.1(a)(1)–(14)	General Applicability	Yes.	
§63.1(b)(1)–(3)	Initial Applicability Determination	Yes	Applicability to subpart PPPP is also specified in §63.4481.
§63.1(c)(1)	Applicability After Standard Established	Yes.	
§63.1(c)(2)–(3)	Applicability of Permit Program for Area Sources	No	Area sources are not subject to subpart PPPP.
§63.1(c)(4)–(5)	Extensions and Notifications	Yes.	
§63.1(e)	Applicability of Permit Program Before Relevant Standard is Set	Yes.	
§63.2	Definitions	Yes	Additional definitions are specified in §63.4581.
§63.3(a)–(c)	Units and Abbreviations	Yes.	
§63.4(a)(1)–(5)	Prohibited Activities	Yes.	
§63.4(b)–(c)	Circumvention/Severability	Yes.	
§63.5(a)	Construction/Reconstruction	Yes.	
§63.5(b)(1)–(6)	Requirements for Existing, Newly Constructed, and Reconstructed Sources	Yes.	
§63.5(d)	Application for Approval of Construction/Reconstruction	Yes.	
§63.5(e)	Approval of Construction/Reconstruction	Yes.	
§63.5(f)	Approval of Construction/Reconstruction Based on Prior State Review	Yes.	
§63.6(a)	Compliance With Standards and Maintenance Requirements—Applicability	Yes.	
§63.6(b)(1)–(7)	Compliance Dates for New and Reconstructed Sources	Yes	Section 63.4483 specifies the compliance dates.
§63.6(c)(1)–(5)	Compliance Dates for Existing Sources	Yes	Section 63.4483 specifies the compliance dates.
§63.6(e)(1)–(2)	Operation and Maintenance	Yes.	

Citation	Subject	Applicable to subpart PPPP	Explanation
§63.6(e)(3)	Startup, Shutdown, and Malfunction Plan	Yes	Only sources using an add-on control device to comply with the standard must complete startup, shutdown, and malfunction plans.
§63.6(f)(1)	Compliance Except During Startup, Shutdown, and Malfunction	Yes	Applies only to sources using an add-on control device to comply with the standard.
§63.6(f)(2)–(3)	Methods for Determining Compliance	Yes.	
§63.6(g)(1)–(3)	Use of an Alternative Standard	Yes.	
§63.6(h)	Compliance With Opacity/Visible Emission Standards	No	Subpart PPPP does not establish opacity standards and does not require continuous opacity monitoring systems (COMS).
§63.6(i)(1)–(16)	Extension of Compliance	Yes.	
§63.6(j)	Presidential Compliance Exemption	Yes.	
§63.7(a)(1)	Performance Test Requirements—Applicability	Yes	Applies to all affected sources. Additional requirements for performance testing are specified in §§63.4564, 63.4565, and 63.4566.
§63.7(a)(2)	Performance Test Requirements—Dates	Yes	Applies only to performance tests for capture system and control device efficiency at sources using these to comply with the standards. Section 63.4560 specifies the schedule for performance test requirements that are earlier than those specified in §63.7(a)(2).
§63.7(a)(3)	Performance Tests Required By the Administrator	Yes.	
§63.7(b)–(e)	Performance Test Requirements—Notification, Quality Assurance, Facilities Necessary for Safe Testing, Conditions During Test	Yes	Applies only to performance tests for capture system and add-on control device efficiency at sources using these to comply with the standards.
§63.7(f)	Performance Test Requirements—Use Alternative Test Method	Yes	Applies to all test methods except those of used to determine capture system efficiency.
§63.7(g)–(h)	Performance Test Requirements—Data Analysis, Recordkeeping,	Yes	Applies only to performance tests for capture system and add-on control device efficiency at sources using

Citation	Subject	Applicable to subpart PPPP	Explanation
	Reporting, Waiver of Test		these to comply with the standards.
§63.8(a)(1)–(3)	Monitoring Requirements—Applicability	Yes	Applies only to monitoring of capture system and add-on control device efficiency at sources using these to comply with the standards. Additional requirements for monitoring are specified in §63.4568.
§63.8(a)(4)	Additional Monitoring Requirements	No	Subpart PPPP does not have monitoring requirements for flares.
§63.8(b)	Conduct of Monitoring	Yes.	
§63.8(c)(1)–(3)	Continuous Monitoring Systems (CMS) Operation and Maintenance	Yes	Applies only to monitoring of capture system and add-on control device efficiency at sources using these to comply with the standard. Additional requirements for CMS operations and maintenance are specified in §63.4568.
§63.8(c)(4)	CMS	No	Section 63.4568 specifies the requirements for the operation of CMS for capture systems and add-on control devices at sources using these to comply.
§63.8(c)(5)	COMS	No	Subpart PPPP does not have opacity or visible emission standards.
§63.8(c)(6)	CMS Requirements	No	Section 63.4568 specifies the requirements for monitoring systems for capture systems and add-on control devices at sources using these to comply.
§63.8(c)(7)	CMS Out-of-Control Periods	Yes.	
§63.8(c)(8)	CMS Out-of-Control Periods and Reporting	No	Section 63.4520 requires reporting of CMS out-of-control periods.
§63.8(d)–(e)	Quality Control Program and CMS Performance Evaluation	No	Subpart PPPP does not require the use of continuous emissions monitoring systems.
§63.8(f)(1)–(5)	Use of an Alternative Monitoring Method	Yes.	
§63.8(f)(6)	Alternative to Relative Accuracy Test	No	Subpart PPPP does not require the use of continuous emissions monitoring systems.
§63.8(g)(1)–(5)	Data Reduction	No	Sections 63.4567 and 63.4568 specify monitoring data reduction.

Citation	Subject	Applicable to subpart PPPP	Explanation
§63.9(a)–(d)	Notification Requirements	Yes.	
§63.9(e)	Notification of Performance Test	Yes	Applies only to capture system and add-on control device performance tests at sources using these to comply with the standards.
§63.9(f)	Notification of Visible Emissions/Opacity Test	No	Subpart PPPP does not have opacity or visible emission standards.
§63.9(g)(1)–(3)	Additional Notifications When Using CMS	No	Subpart PPPP does not require the use of continuous emissions monitoring systems.
§63.9(h)	Notification of Compliance Status	Yes	Section 63.4510 specifies the dates for submitting the notification of compliance status.
§63.9(i)	Adjustment of Submittal Deadlines	Yes.	
§63.9(j)	Change in Previous Information	Yes.	
§63.10(a)	Recordkeeping/Reporting—Applicability and General Information	Yes.	
§63.10(b)(1)	General Recordkeeping Requirements	Yes	Additional requirements are specified in §§63.4530 and 63.4531.
§63.10(b)(2) (i)–(v)	Recordkeeping Relevant to Startup, Shutdown, and Malfunction Periods and CMS	Yes	Requirements for startup, shutdown, and malfunction records only apply to add-on control devices used to comply with the standards.
§63.10(b)(2) (vi)–(xi)		Yes.	
§63.10(b)(2) (xii)	Records	Yes.	
§63.10(b)(2) (xiii)		No	Subpart PPPP does not require the use of continuous emissions monitoring systems.
§63.10(b)(2) (xiv)		Yes.	
§63.10(b)(3)	Recordkeeping Requirements for Applicability Determinations	Yes.	
§63.10(c)(1)–(6)	Additional Recordkeeping Requirements for Sources with CMS	Yes	
§63.10(c)(7)–(8)		No	The same records are required in

Citation	Subject	Applicable to subpart PPPP	Explanation
			§63.4520(a)(7).
§63.10(c)(9)–(15)		Yes.	
§63.10(d)(1)	General Reporting Requirements	Yes	Additional requirements are specified in §63.4520.
§63.10(d)(2)	Report of Performance Test Results	Yes	Additional requirements are specified in §63.4520(b).
§63.10(d)(3)	Reporting Opacity or Visible Emissions Observations	No	Subpart PPPP does not require opacity or visible emissions observations.
§63.10(d)(4)	Progress Reports for Sources With Compliance Extensions	Yes.	
§63.10(d)(5)	Startup, Shutdown, and Malfunction Reports	Yes	Applies only to add-on control devices at sources using these to comply with the standards.
§63.10(e)(1)–(2)	Additional CMS Reports	No	Subpart PPPP does not require the use of continuous emissions monitoring systems.
§63.10(e)(3)	Excess Emissions/CMS Performance Reports	No	Section 63.4520(b) specifies the contents of periodic compliance reports.
§63.10(e)(4)	COMS Data Reports	No	Subpart PPPP does not specify requirements for opacity or COMS.
§63.10(f)	Recordkeeping/Reporting Waiver	Yes.	
§63.11	Control Device Requirements/Flares	No	Subpart PPPP does not specify use of flares for compliance.
§63.12	State Authority and Delegations	Yes.	
§63.13	Addresses	Yes.	
§63.14	Incorporation by Reference	Yes.	
§63.15	Availability of Information/Confidentiality	Yes.	

Table 3 to Subpart PPPP of Part 63—
Default Organic HAP Mass Fraction for Solvents and Solvent Blends

You may use the mass fraction values in the following table for solvent blends for which you do not have test data or manufacturer's formulation data and which match either the solvent blend name or the chemical abstract series (CAS) number. If a solvent blend matches both the name and CAS number for an entry, that entry's organic HAP mass fraction must be used for that solvent blend. Otherwise, use the organic HAP mass fraction for the entry matching either the solvent blend name or CAS number, or use the organic HAP mass fraction from table 4 to this subpart if neither the name or CAS number match.

Solvent/solvent blend	CAS. No.	Average organic HAP mass fraction	Typical organic HAP, percent by mass
1. Toluene	108–88–3	1.0	Toluene.
2. Xylene(s)	1330–20–7	1.0	Xylenes, ethylbenzene.
3. Hexane	110–54–3	0.5	n-hexane.
4. n-Hexane	110–54–3	1.0	n-hexane.
5. Ethylbenzene	100–41–4	1.0	Ethylbenzene.
6. Aliphatic 140		0	None.
7. Aromatic 100		0.02	1% xylene, 1% cumene.
8. Aromatic 150		0.09	Naphthalene.
9. Aromatic naphtha	64742–95–6	0.02	1% xylene, 1% cumene.
10. Aromatic solvent	64742–94–5	0.1	Naphthalene.
11. Exempt mineral spirits	8032–32–4	0	None.
12. Ligroines (VM & P)	8032–32–4	0	None.
13. Lactol spirits	64742–89–6	0.15	Toluene.
14. Low aromatic white spirit	64742–82–1	0	None.
15. Mineral spirits	64742–88–7	0.01	Xylenes.
16. Hydrotreated naphtha	64742–48–9	0	None.
17. Hydrotreated light distillate	64742–47–8	0.001	Toluene.
18. Stoddard solvent	8052–41–3	0.01	Xylenes.
19. Super high-flash naphtha	64742–95–6	0.05	Xylenes.
20. Varsol®solvent	8052–49–3	0.01	0.5% xylenes, 0.5% ethylbenzene.
21. VM & P naphtha	64742–89–8	0.06	3% toluene, 3% xylene.
22. Petroleum distillate mixture	68477–31–6	0.08	4% naphthalene, 4% biphenyl.

Table 4 to Subpart PPPP of Part 63—
Default Organic HAP Mass Fraction for Petroleum Solvent Groups[a]

You may use the mass fraction values in the following table for solvent blends for which you do not have test data or manufacturer's formulation data.

Solvent type	Average organic HAP mass fraction	Typical organic HAP, percent by mass
Aliphatic[b]	0.03	1% Xylene, 1% Toluene, and 1% Ethylbenzene.
Aromatic[c]	0.06	4% Xylene, 1% Toluene, and 1% Ethylbenzene.

[a]Use this table only if the solvent blend does not match any of the solvent blends in Table 3 to this subpart by either solvent blend name or CAS number and you only know whether the blend is aliphatic or aromatic.
[b]Mineral Spirits 135, Mineral Spirits 150 EC, Naphtha, Mixed Hydrocarbon, Aliphatic Hydrocarbon, Aliphatic Naphtha, Naphthol Spirits, Petroleum Spirits, Petroleum Oil, Petroleum Naphtha, Solvent Naphtha, Solvent Blend.
[c]Medium-flash Naphtha, High-flash Naphtha, Aromatic Naphtha, Light Aromatic Naphtha, Light Aromatic Hydrocarbons, Aromatic Hydrocarbons, Light Aromatic Solvent.

Appendix A to Subpart PPPP of Part 63—
Determination of Weight Volatile Matter Content and Weight Solids Content of Reactive Adhesives

1.0 Applicability and Principle

1.1 *Applicability:* This method applies to the determination of weight volatile matter content and weight solids content for most one-part or multiple-part reactive adhesives. Reactive adhesives are composed, in large part, of monomers that react during the adhesive curing reaction, and, as a result, do not volatilize. The monomers become integral parts of the cured adhesive through chemical reaction. At least 70 weight percent of the system, excluding water and non-volatile solids such as fillers, react during the process. This method is not appropriate for cyanoacrylates. For cyanoacrylates, South Coast Air Quality Management District Test Method 316B should be used. This method is not appropriate for one-part moisture cure urethane adhesives or for silicone adhesives. For one-part moisture cure urethane adhesives and for silicone adhesives, EPA Method 24 should be used.

1.2 Principle: One-part and multiple-part reactive adhesives undergo a reactive conversion from liquid to solid during the application and assembly process. Reactive adhesives are applied to a single surface, but then are usually quickly covered with another mating surface to achieve a bonded assembly. The monomers employed in such systems typically react and are converted to non-volatile solids. If left uncovered, as in a Method 24 (ASTM D2369) test, the reaction is inhibited by the presence of oxygen and volatile loss of the reactive components competes more heavily with the cure reaction. If this were to happen under normal use conditions, the adhesives would not provide adequate performance. This method minimizes this undesirable deterioration of the adhesive performance.

2.0 Materials and Apparatus

2.1 Aluminum foil, aluminum sheet, non-leaching plastic film or non-leaching plastic sheet, approximately 3 inches by 3 inches. Precondition the foil, film, or sheet for 30 minutes in an oven at 110 ±5 degrees Celsius and store in a desiccator prior to use. Use tongs or rubber gloves or both to handle the foil, film, or sheet.

2.2 Flat, rigid support panels slightly larger than the foil, film, or sheet. Polypropylene with a minimum thickness of1/8inch is recommended for the support panels. Precondition the support panels for 30 minutes in an oven at 110 ±5 degrees Celsius and store in a desiccator prior to use. Use tongs or rubber gloves or both to handle the support panels.

2.3 Aluminum spacers,1/8inch thick. Precondition the spacers for 30 minutes in an oven at 110 ±5 degrees Celsius and store in a desiccator prior to use. Use tongs or rubber gloves or both to handle the spacers.

2.4 Forced draft oven, type IIA or IIB as specified in ASTM E145–94 (Reapproved 2001), "Standard Specification for Gravity-Convection and Forced-Ventilation Ovens" (incorporated by reference, see §63.14).

2.5 Electronic balance capable of weighing to ±0.0001 grams (0.1 mg).

2.6 Flat bottom weight (approximately 3 lbs) or clamps.

Material and Apparatus Notes
1 — The foil, film, or sheet should be thick or rigid enough so that it can be easily handled in the test procedure.

3.0 Procedure

3.1 Two procedures are provided. In Procedure A the initial specimen weight is determined by weighing the foil, film, or sheet before and after the specimen is dispensed onto the foil, film, or sheet. In Procedure B the initial specimen weight is determined by weighing the adhesive cartridge (kit) before and after the specimen is dispensed.

3.2 At least four test specimens should be run for each test material. Run the test at room temperature, 74 degrees Fahrenheit (23 degrees Celsius).

Procedure A

1. Zero electronic balance.
2. Place 2 pieces of aluminum foil (or aluminum sheet, plastic film, or plastic sheet) on scale.
3. Record weight of aluminum foils. (A).
4. Tare balance.
5. Remove top piece of aluminum foil.
6. Dispense a 10 to 15 gram specimen of premixed adhesive onto bottom piece of aluminum foil. Place second piece of aluminum foil on top of the adhesive specimen to make a sandwich.
7. Record weight of sandwich (specimen and aluminum foils). (B).
8. Remove sandwich from scale, place sandwich between two support panels with aluminum spacers at the edges of the support panels to make a supported sandwich. The spacers provide a standard gap. Take care to mate the edges.
9. Place the supported sandwich on a flat surface.
10. Place the weight on top of the supported sandwich to spread the adhesive specimen to a uniform thickness within the sandwich. Check that no adhesive squeezes out from between the pieces of aluminum foil or through tears in the aluminum foil.
11. Allow to cure 24 hours.
12. Remove the sandwich from between the support panels. Record the weight of the sandwich. This is referred to as the 24 hr weight. (C).
13. Bake sandwich at 110 degrees Celsius for 1 hour.
14. Remove sandwich from the oven, place immediately in a desiccator, and cool to room temperature. Record post bake sandwich weight. (D).

Procedure B

1. Zero electronic balance.
2. Place two pieces of aluminum foil (or aluminum sheet, plastic film, or plastic sheet) on scale.
3. Record weight of aluminum foils. (A).
4. Tare balance.

5. Place one support panel on flat surface. Place first piece of aluminum foil on top of this support panel.
6. Record the weight of a pre-mixed sample of adhesive in its container. If dispensing the adhesive from a cartridge (kit), record the weight of the cartridge (kit) plus any dispensing tips. (F).
7. Dispense a 10 to 15 gram specimen of mixed adhesive onto the first piece of aluminum foil. Place second piece of aluminum foil on top of the adhesive specimen to make a sandwich.
8. Record weight of the adhesive container. If dispensing the adhesive from a cartridge (kit), record the weight of the cartridge (kit) plus any dispensing tips. (G).
9. Place the aluminum spacers at the edges of the bottom support panel polypropylene sheet. The spacers provide a standard gap.
10. Place the second support panel on top of the assembly to make a supported sandwich. Take care to mate the edges.
11. Place the supported sandwich on a flat surface.
12. Place the weight on top of the supported sandwich to spread the adhesive specimen to a uniform thickness within the sandwich. Check that no adhesive squeezes out from between the pieces of aluminum foil or through tears in the aluminum foil.
13. Allow to cure 24 hours.
14. Remove the sandwich from between the support panels. Record the weight of the sandwich. This is referred to as the 24 hr weight. (C).
15. Bake sandwich at 110 degrees Celsius for 1 hour.
16. Remove sandwich from the oven, place immediately in a desiccator, and cool to room temperature.
17. Record post-bake sandwich weight. (D).

Procedural Notes

1 — The support panels may be omitted if the aluminum foil (or aluminum sheet, plastic film, or plastic sheet) will not tear and the adhesive specimen will spread to a uniform thickness within the sandwich when the flat weight is placed directly on top of the sandwich.

2 — Clamps may be used instead of a flat bottom weight to spread the adhesive specimen to a uniform thickness within the sandwich.

3 — When dispensing from a static mixer, purging is necessary to ensure uniform, homogeneous specimens. The weighing in Procedure B, Step 6 must be performed after any purging.

4 — Follow the adhesive manufacturer's directions for mixing and for dispensing from a cartridge (kit).

4.0 Calculations

4.1 The total weight loss from curing and baking of each specimen is used to determine the weight percent volatile matter content of that specimen

Procedure A

Weight of original specimen (S) = (B)–(A)
Weight of post-bake specimen (P) = (D)–(A)
Total Weight Loss (L) = (S)–(P)

Procedure B

Weight of original specimen (S) = (F)–(G)
Weight of post-bake specimen (P) = (D)–(A)
Total Weight Loss (L) = (S)–(P)
Procedure A and Procedure B
Weight Percent Volatile Matter Content
(V) = [(Total weight loss)/(Initial specimen weight)] × 100 = [(L)/(S)] × 100

4.2 The weight volatile matter content of a material is the average of the weight volatile matter content of each specimen of that material. For example, if four specimens of a material were tested, then the weight percent volatile matter content for that material is:

$V = [V1 + V2 + V3 + V4]/4$

Where:

Vi = the weight percent volatile matter content of specimen i of the material.

4.3 The weight percent solids content of the material is calculated from the weight percent volatile content of the material.

Weight Percent Solids Content (N) = 100−(V)

Calculation Notes

1 — The weight loss during curing and the weight loss during baking may be calculated separately. These values may be useful for identifying sources of variation in the results obtained for different specimens of the same material.

2 — For both Procedure A and Procedure B, the weight loss during curing is (S)−[(C)−(A)] and the weight loss during baking is (C)−(D).

Subpart Dc— Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units

Source: 72 FR 32759, June 13, 2007, unless otherwise noted.

§ 60.40c Applicability and delegation of authority.

(a) Except as provided in paragraph (d) of this section, the affected facility to which this subpart applies is each steam generating unit for which construction, modification, or reconstruction is commenced after June 9, 1989 and that has a maximum design heat input capacity of 29 megawatts (MW) (100 million British thermal units per hour (MMBtu/hr)) or less, but greater than or equal to 2.9 MW (10 MMBtu/hr).

(b) In delegating implementation and enforcement authority to a State under section 111(c) of the Clean Air Act, §60.48c(a)(4) shall be retained by the Administrator and not transferred to a State.

(c) Steam generating units that meet the applicability requirements in paragraph (a) of this section are not subject to the sulfur dioxide (SO_2) or particulate matter (PM) emission limits, performance testing requirements, or monitoring requirements under this subpart (§§60.42c, 60.43c, 60.44c, 60.45c, 60.46c, or 60.47c) during periods of combustion research, as defined in §60.41c.

(d) Any temporary change to an existing steam generating unit for the purpose of conducting combustion research is not considered a modification under §60.14.

(e) Heat recovery steam generators that are associated with combined cycle gas turbines and meet the applicability requirements of subpart GG or KKKK of this part are not subject to this subpart. This subpart will continue to apply to all other heat recovery steam generators that are capable of combusting more than or equal to 2.9 MW (10 MMBtu/hr) heat input of fossil fuel but less than or equal to 29 MW (100 MMBtu/hr) heat input of fossil fuel. If the heat recovery steam generator is subject to this subpart, only emissions resulting from combustion of fuels in the steam generating unit are subject to this subpart. (The gas turbine emissions are subject to subpart GG or KKKK, as applicable, of this part).

(f) Any facility covered by subpart AAAA of this part is not covered by this subpart.

(g) Any facility covered by an EPA approved State or Federal section 111(d)/129 plan implementing subpart BBBB of this part is not covered by this subpart.

§ 60.41c Definitions.

As used in this subpart, all terms not defined herein shall have the meaning given them in the Clean Air Act and in subpart A of this part.

Annual capacity factor means the ratio between the actual heat input to a steam generating unit from an individual fuel or combination of fuels during a period of 12 consecutive calendar months and the potential heat input to the steam generating unit from all fuels had the steam generating unit been operated for 8,760 hours during that 12-month period at the maximum design heat input capacity. In the case of steam generating units that are rented or leased, the actual heat input shall be determined based on the combined heat input from all operations of the affected facility during a period of 12 consecutive calendar months.

Coal means all solid fuels classified as anthracite, bituminous, subbituminous, or lignite by the American Society of Testing and Materials in ASTM D388 (incorporated by reference, see §60.17), coal refuse, and petroleum coke. Coal-derived synthetic fuels derived from coal for the purposes of creating useful heat, including but not limited to solvent refined coal, gasified coal, coal-oil mixtures, and coal-water mixtures, are also included in this definition for the purposes of this subpart.

Coal refuse means any by-product of coal mining or coal cleaning operations with an ash content greater than 50 percent (by weight) and a heating value less than 13,900 kilojoules per kilogram (kJ/kg) (6,000 Btu per pound (Btu/lb) on a dry basis.

Cogeneration steam generating unit means a steam generating unit that simultaneously produces both electrical (or mechanical) and thermal energy from the same primary energy source.

Combined cycle system means a system in which a separate source (such as a stationary gas turbine, internal combustion engine, or kiln) provides exhaust gas to a steam generating unit.

Combustion research means the experimental firing of any fuel or combination of fuels in a steam generating unit for the purpose of conducting research and development of more efficient combustion or more effective prevention or control of air pollutant emissions from combustion, provided that, during these periods of research and development, the heat generated is not used for any purpose other than preheating combustion air for use by that steam generating unit (i.e. , the heat generated is released to the atmosphere without being used for space heating, process heating, driving pumps, preheating combustion air for other units, generating electricity, or any other purpose).

Conventional technology means wet flue gas desulfurization technology, dry flue gas desulfurization technology, atmospheric fluidized bed combustion technology, and oil hydrodesulfurization technology.

Distillate oil means fuel oil that complies with the specifications for fuel oil numbers 1 or 2, as defined by the American Society for Testing and Materials in ASTM D396 (incorporated by reference, see §60.17).

Dry flue gas desulfurization technology means a SO_2 control system that is located between the steam generating unit and the exhaust vent or stack, and that removes sulfur oxides from the combustion gases of the steam generating unit by contacting the combustion gases with an alkaline reagent and water, whether introduced separately or as a premixed slurry or solution and forming a dry powder material. This definition includes devices where the dry powder material is subsequently converted to another form. Alkaline reagents used in dry flue gas desulfurization systems include, but are not limited to, lime and sodium compounds.

Duct burner means a device that combusts fuel and that is placed in the exhaust duct from another source (such as a stationary gas turbine, internal combustion engine, kiln, etc.) to allow the firing of additional fuel to heat the exhaust gases before the exhaust gases enter a steam generating unit.

Emerging technology means any SO_2 control system that is not defined as a conventional technology under this section, and for which the owner or operator of the affected facility has received approval from the Administrator to operate as an emerging technology under §60.48c(a)(4).

Federally enforceable means all limitations and conditions that are enforceable by the Administrator, including the requirements of 40 CFR parts 60 and 61, requirements within any applicable State implementation plan, and any permit requirements established under 40 CFR 52.21 or under 40 CFR 51.18 and 51.24.

Fluidized bed combustion technology means a device wherein fuel is distributed onto a bed (or series of beds) of limestone aggregate (or other sorbent materials) for combustion; and these materials are forced upward in the device by the flow of combustion air and the gaseous products of combustion. Fluidized bed combustion technology includes, but is not limited to, bubbling bed units and circulating bed units.

Fuel pretreatment means a process that removes a portion of the sulfur in a fuel before combustion of the fuel in a steam generating unit.

Heat input means heat derived from combustion of fuel in a steam generating unit and does not include the heat derived from preheated combustion air, recirculated flue gases, or exhaust gases from other sources (such as stationary gas turbines, internal combustion engines, and kilns).

Heat transfer medium means any material that is used to transfer heat from one point to another point.

Maximum design heat input capacity means the ability of a steam generating unit to combust a stated maximum amount of fuel (or combination of fuels) on a steady state basis as determined by the physical design and characteristics of the steam generating unit.

Natural gas means: (1) A naturally occurring mixture of hydrocarbon and nonhydrocarbon gases found in geologic formations beneath the earth's surface, of which the principal constituent is methane; or (2) liquefied petroleum (LP) gas, as defined by the American Society for Testing and Materials in ASTM D1835 (incorporated by reference, see §60.17).

Noncontinental area means the State of Hawaii, the Virgin Islands, Guam, American Samoa, the Commonwealth of Puerto Rico, or the Northern Mariana Islands.

Oil means crude oil or petroleum, or a liquid fuel derived from crude oil or petroleum, including distillate oil and residual oil.

Potential sulfur dioxide emission rate means the theoretical SO_2 emissions (nanograms per joule (ng/J) or lb/MMBtu heat input) that would result from combusting fuel in an uncleaned state and without using emission control systems.

Process heater means a device that is primarily used to heat a material to initiate or promote a chemical reaction in which the material participates as a reactant or catalyst.

Residual oil means crude oil, fuel oil that does not comply with the specifications under the definition of distillate oil, and all fuel oil numbers 4, 5, and 6, as defined by the American Society for Testing and Materials in ASTM D396 (incorporated by reference, see §60.17).

Steam generating unit means a device that combusts any fuel and produces steam or heats water or any other heat transfer medium. This term includes any duct burner that combusts fuel and is part of a combined cycle system. This term does not include process heaters as defined in this subpart.

Steam generating unit operating day means a 24-hour period between 12:00 midnight and the following midnight during which any fuel is combusted at any time in the steam generating unit. It is not necessary for fuel to be combusted continuously for the entire 24-hour period.

Wet flue gas desulfurization technology means an SO_2 control system that is located between the steam generating unit and the exhaust vent or stack, and that removes sulfur oxides from the combustion gases of the steam generating unit by contacting the combustion gases with an alkaline slurry or solution and forming a liquid material. This definition includes devices where the liquid material is subsequently converted to another form. Alkaline reagents used in wet flue gas desulfurization systems include, but are not limited to, lime, limestone, and sodium compounds.

Wet scrubber system means any emission control device that mixes an aqueous stream or slurry with the exhaust gases from a steam generating unit to control emissions of PM or SO_2.

Wood means wood, wood residue, bark, or any derivative fuel or residue thereof, in any form, including but not limited to sawdust, sanderdust, wood chips, scraps, slabs, millings, shavings, and processed pellets made from wood or other forest residues.

§ 60.42c Standard for sulfur dioxide (SO_2).

(a) Except as provided in paragraphs (b), (c), and (e) of this section, on and after the date on which the performance test is completed or required to be completed under §60.8, whichever date comes first, the owner or operator of an affected facility that combusts only coal shall neither: cause to be discharged into the atmosphere from the affected facility any gases that contain SO_2 in excess of 87 ng/J (0.20 lb/MMBtu) heat input or 10 percent (0.10) of the potential SO_2 emission rate (90 percent reduction), nor cause to be discharged into the atmosphere from the affected facility any gases that contain SO_2 in excess of 520 ng/J (1.2 lb/MMBtu) heat input. If coal is combusted with other fuels, the affected facility shall neither: cause to be discharged into the atmosphere from the affected facility any gases that contain SO_2 in excess of 87 ng/J (0.20

lb/MMBtu) heat input or 10 percent (0.10) of the potential SO_2 emission rate (90 percent reduction), nor cause to be discharged into the atmosphere from the affected facility any gases that contain SO_2 in excess of the emission limit is determined pursuant to paragraph (e)(2) of this section.

(b) Except as provided in paragraphs (c) and (e) of this section, on and after the date on which the performance test is completed or required to be completed under §60.8, whichever date comes first, the owner or operator of an affected facility that:

(1) Combusts only coal refuse alone in a fluidized bed combustion steam generating unit shall neither:

(i) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of 87 ng/J (0.20 lb/MMBtu) heat input or 20 percent (0.20) of the potential SO_2 emission rate (80 percent reduction); nor

(ii) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of SO_2 in excess of 520 ng/J (1.2 lb/MMBtu) heat input. If coal is fired with coal refuse, the affected facility subject to paragraph (a) of this section. If oil or any other fuel (except coal) is fired with coal refuse, the affected facility is subject to the 87 ng/J (0.20 lb/MMBtu) heat input SO_2 emissions limit or the 90 percent SO_2 reduction requirement specified in paragraph (a) of this section and the emission limit is determined pursuant to paragraph (e)(2) of this section.

(2) Combusts only coal and that uses an emerging technology for the control of SO_2 emissions shall neither:

(i) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of 50 percent (0.50) of the potential SO_2 emission rate (50 percent reduction); nor

(ii) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of 260 ng/J (0.60 lb/MMBtu) heat input. If coal is combusted with other fuels, the affected facility is subject to the 50 percent SO_2 reduction requirement specified in this paragraph and the emission limit determined pursuant to paragraph (e)(2) of this section.

(c) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, alone or in combination with any other fuel, and is listed in paragraphs (c)(1), (2), (3), or (4) of this section shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of the emission limit determined pursuant to paragraph (e)(2) of this section. Percent reduction requirements are not applicable to affected facilities under paragraphs (c)(1), (2), (3), or (4).

(1) Affected facilities that have a heat input capacity of 22 MW (75 MMBtu/hr) or less.

(2) Affected facilities that have an annual capacity for coal of 55 percent (0.55) or less and are subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor for coal of 55 percent (0.55) or less.

(3) Affected facilities located in a noncontinental area.

(4) Affected facilities that combust coal in a duct burner as part of a combined cycle system where 30 percent (0.30) or less of the heat entering the steam generating unit is from combustion of coal in the duct burner and 70 percent (0.70) or more of the heat entering the steam generating unit is from exhaust gases entering the duct burner.

(d) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that combusts oil shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of 215 ng/J (0.50 lb/MMBtu) heat input; or, as an alternative, no owner or operator of an affected facility that combusts oil shall combust oil in the affected facility that contains greater than 0.5 weight percent sulfur. The percent reduction requirements are not applicable to affected facilities under this paragraph.

(e) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, oil, or coal and oil with any other fuel shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO_2 in excess of the following:

(1) The percent of potential SO_2 emission rate or numerical SO_2 emission rate required under paragraph (a) or (b)(2) of this section, as applicable, for any affected facility that

(i) Combusts coal in combination with any other fuel;

(ii) Has a heat input capacity greater than 22 MW (75 MMBtu/hr); and

(iii) Has an annual capacity factor for coal greater than 55 percent (0.55); and

(2) The emission limit determined according to the following formula for any affected facility that combusts coal, oil, or coal and oil with any other fuel:

$$E_s = \frac{(K_a H_a + K_b H_b + K_c H_c)}{(H_a + H_b + H_c)}$$

Where:
E_s= SO_2 emission limit, expressed in ng/J or lb/MMBtu heat input;
K_a= 520 ng/J (1.2 lb/MMBtu);
K_b= 260 ng/J (0.60 lb/MMBtu);
K_c= 215 ng/J (0.50 lb/MMBtu);
H_a= Heat input from the combustion of coal, except coal combusted in an affected facility subject to paragraph (b)(2) of this section, in Joules (J) [MMBtu];
H_b= Heat input from the combustion of coal in an affected facility subject to paragraph (b)(2) of this section, in J (MMBtu); and
$H_c K_a H_b$= Heat input from the combustion of oil, in J (MMBtu).

(f) Reduction in the potential SO_2 emission rate through fuel pretreatment is not credited toward the percent reduction requirement under paragraph (b)(2) of this section unless:

(1) Fuel pretreatment results in a 50 percent (0.50) or greater reduction in the potential SO_2 emission rate; and

(2) Emissions from the pretreated fuel (without either combustion or post-combustion SO_2 control) are equal to or less than the emission limits specified under paragraph (b)(2) of this section.

(g) Except as provided in paragraph (h) of this section, compliance with the percent reduction requirements, fuel oil sulfur limits, and emission limits of this section shall be determined on a 30-day rolling average basis.

(h) For affected facilities listed under paragraphs (h)(1), (2), or (3) of this section, compliance with the emission limits or fuel oil sulfur limits under this section may be determined based on a certification from the fuel supplier, as described under §60.48c(f), as applicable.

(1) Distillate oil-fired affected facilities with heat input capacities between 2.9 and 29 MW (10 and 100 MMBtu/hr).

(2) Residual oil-fired affected facilities with heat input capacities between 2.9 and 8.7 MW (10 and 30 MMBtu/hr).

(3) Coal-fired facilities with heat input capacities between 2.9 and 8.7 MW (10 and 30 MMBtu/hr).

(i) The SO_2 emission limits, fuel oil sulfur limits, and percent reduction requirements under this section apply at all times, including periods of startup, shutdown, and malfunction.

(j) Only the heat input supplied to the affected facility from the combustion of coal and oil is counted under this section. No credit is provided for the heat input to the affected facility from wood or other fuels or for heat derived from exhaust gases from other sources, such as stationary gas turbines, internal combustion engines, and kilns.

§ 60.43c Standard for particulate matter (PM).

(a) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that commenced construction, reconstruction, or modification on or before February 28, 2005, that combusts coal or combusts mixtures of coal with other fuels and has a heat input capacity of 8.7 MW (30 MMBtu/hr) or greater, shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of the following emission limits:

(1) 22 ng/J (0.051 lb/MMBtu) heat input if the affected facility combusts only coal, or combusts coal with other fuels and has an annual capacity factor for the other fuels of 10 percent (0.10) or less.

(2) 43 ng/J (0.10 lb/MMBtu) heat input if the affected facility combusts coal with other fuels, has an annual capacity factor for the other fuels greater than 10 percent (0.10), and is subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor greater than 10 percent (0.10) for fuels other than coal.

(b) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that commenced construction, reconstruction, or modification on or before February 28, 2005, that combusts wood or combusts mixtures of wood with other fuels (except coal) and has a heat input capacity of 8.7 MW (30 MMBtu/hr) or greater, shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of the following emissions limits:

(1) 43 ng/J (0.10 lb/MMBtu) heat input if the affected facility has an annual capacity factor for wood greater than 30 percent (0.30); or

(2) 130 ng/J (0.30 lb/MMBtu) heat input if the affected facility has an annual capacity factor for wood of 30 percent (0.30) or less and is subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor for wood of 30 percent (0.30) or less.

(c) On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, wood, or oil and has a heat input capacity of 8.7 MW (30 MMBtu/hr) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that

exhibit greater than 20 percent opacity (6-minute average), except for one 6-minute period per hour of not more than 27 percent opacity.

(d) The PM and opacity standards under this section apply at all times, except during periods of startup, shutdown, or malfunction.

(e) (1) On and after the date on which the initial performance test is completed or is required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that commences construction, reconstruction, or modification after February 28, 2005, and that combusts coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels and has a heat input capacity of 8.7 MW (30 MMBtu/hr) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of 13 ng/J (0.030 lb/MMBtu) heat input, except as provided in paragraphs (e)(2), (e)(3), and (e)(4) of this section.

(2) As an alternative to meeting the requirements of paragraph (e)(1) of this section, the owner or operator of an affected facility for which modification commenced after February 28, 2005, may elect to meet the requirements of this paragraph. On and after the date on which the initial performance test is completed or required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that commences modification after February 28, 2005 shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of both:

(i) 22 ng/J (0.051 lb/MMBtu) heat input derived from the combustion of coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels; and

(ii) 0.2 percent of the combustion concentration (99.8 percent reduction) when combusting coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels.

(3) On and after the date on which the initial performance test is completed or is required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that commences modification after February 28, 2005, and that combusts over 30 percent wood (by heat input) on an annual basis and has a heat input capacity of 8.7 MW (30 MMBtu/hr) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of 43 ng/J (0.10 lb/MMBtu) heat input.

(4) On and after the date on which the initial performance test is completed or is required to be completed under §60.8, whichever date comes first, an owner or operator of an affected facility that commences construction, reconstruction, or modification after February 28, 2005, and that combusts only oil that contains no more than 0.50 weight percent sulfur or a mixture of 0.50 weight percent sulfur oil with other fuels not subject to a PM standard under §60.43c and not using a post-combustion technology (except a wet scrubber) to reduce PM or SO_2 emissions is not subject to the PM limit in this section.

§ 60.44c Compliance and performance test methods and procedures for sulfur dioxide.

(a) Except as provided in paragraphs (g) and (h) of this section and §60.8(b), performance tests required under §60.8 shall be conducted following the procedures specified in paragraphs (b), (c), (d), (e), and (f) of this section, as applicable. Section 60.8(f) does not apply to this section. The 30-day notice required in §60.8(d) applies only to the initial performance test unless otherwise specified by the Administrator.

(b) The initial performance test required under §60.8 shall be conducted over 30 consecutive operating days of the steam generating unit. Compliance with the percent reduction requirements and SO_2 emission limits under §60.42c shall be determined using a 30-day average. The first operating day included in the initial performance test shall be scheduled within 30 days after achieving the maximum production rate at which the affect facility will be operated, but not later than 180 days after the initial startup of the facility. The steam generating unit load during the 30-

day period does not have to be the maximum design heat input capacity, but must be representative of future operating conditions.

(c) After the initial performance test required under paragraph (b) of this section and §60.8, compliance with the percent reduction requirements and SO_2 emission limits under §60.42c is based on the average percent reduction and the average SO_2 emission rates for 30 consecutive steam generating unit operating days. A separate performance test is completed at the end of each steam generating unit operating day, and a new 30-day average percent reduction and SO_2 emission rate are calculated to show compliance with the standard.

(d) If only coal, only oil, or a mixture of coal and oil is combusted in an affected facility, the procedures in Method 19 of appendix A of this part are used to determine the hourly SO_2 emission rate (E_{ho}) and the 30-day average SO_2 emission rate (E_{ao}). The hourly averages used to compute the 30-day averages are obtained from the CEMS. Method 19 of appendix A of this part shall be used to calculate E_{ao} when using daily fuel sampling or Method 6B of appendix A of this part.

(e) If coal, oil, or coal and oil are combusted with other fuels:

(1) An adjusted E_{ho} ($E_{ho}o$) is used in Equation 19–19 of Method 19 of appendix A of this part to compute the adjusted E_{ao}($E_{ao}o$). The $E_{ho}o$ is computed using the following formula:

$$E_{ho}o = \frac{E_{ho} - E_w(1 - X_k)}{X_k}$$

Where:

$E_{ho}o$ = Adjusted E_{ho}, ng/J (lb/MMBtu);

E_{ho}= Hourly SO_2 emission rate, ng/J (lb/MMBtu);

E_w= SO_2 concentration in fuels other than coal and oil combusted in the affected facility, as determined by fuel sampling and analysis procedures in Method 9 of appendix A of this part, ng/J (lb/MMBtu). The value $E_w$for each fuel lot is used for each hourly average during the time that the lot is being combusted. The owner or operator does not have to measure $E_w$if the owner or operator elects to assume E_w= 0.

X_k= Fraction of the total heat input from fuel combustion derived from coal and oil, as determined by applicable procedures in Method 19 of appendix A of this part.

(2) The owner or operator of an affected facility that qualifies under the provisions of §60.42c(c) or (d) (where percent reduction is not required) does not have to measure the parameters $E_w$or $X_k$if the owner or operator of the affected facility elects to measure emission rates of the coal or oil using the fuel sampling and analysis procedures under Method 19 of appendix A of this part.

(f) Affected facilities subject to the percent reduction requirements under §60.42c(a) or (b) shall determine compliance with the SO_2 emission limits under §60.42c pursuant to paragraphs (d) or (e) of this section, and shall determine compliance with the percent reduction requirements using the following procedures:

(1) If only coal is combusted, the percent of potential SO_2 emission rate is computed using the following formula:

$$\%P_c = 100\left(1 - \frac{\%R_g}{100}\right)\left(1 - \frac{\%R_f}{100}\right)$$

Where:
$\%P_s$= Potential SO_2 emission rate, in percent;
$\%R_g$= SO_2 removal efficiency of the control device as determined by Method 19 of appendix A of this part, in percent; and
$\%R_f$= SO_2 removal efficiency of fuel pretreatment as determined by Method 19 of appendix A of this part, in percent.

(2) If coal, oil, or coal and oil are combusted with other fuels, the same procedures required in paragraph (f)(1) of this section are used, except as provided for in the following:

(i) To compute the $\%P_s$, an adjusted $\%R_g$($\%R_g$o) is computed from E_{ao}o from paragraph (e)(1) of this section and an adjusted average SO_2 inlet rate (E_{ai}o) using the following formula:

$$\%R_g o = 100\left(1 - \frac{E_{ao}^{\circ}}{E_{ai}^{\circ}}\right)$$

Where:
$\%R_g$o = Adjusted $\%R_g$, in percent;
E_{ao}o = Adjusted E_{ao}, ng/J (lb/MMBtu); and
E_{ai}o = Adjusted average SO_2 inlet rate, ng/J (lb/MMBtu).

(ii) To compute E_{ai}o, an adjusted hourly SO_2 inlet rate (E_{hi}o) is used. The E_{hi}o is computed using the following formula:

$$E_{hi}o = \frac{E_{hi} - E_w(1 - X_k)}{X_k}$$

Where:
E_{hi}o = Adjusted E_{hi}, ng/J (lb/MMBtu);
E_{hi}= Hourly SO_2 inlet rate, ng/J (lb/MMBtu);
E_w= SO_2 concentration in fuels other than coal and oil combusted in the affected facility, as determined by fuel sampling and analysis procedures in Method 19 of appendix A of this part, ng/J (lb/MMBtu). The value $E_w$for each fuel lot is used for each hourly average during the time that the lot is being combusted. The owner or operator does not have to measure $E_w$if the owner or operator elects to assume E_w= 0; and
X_k= Fraction of the total heat input from fuel combustion derived from coal and oil, as determined by applicable procedures in Method 19 of appendix A of this part.

(g) For oil-fired affected facilities where the owner or operator seeks to demonstrate compliance with the fuel oil sulfur limits under §60.42c based on shipment fuel sampling, the initial performance test shall consist of sampling and analyzing the oil in the initial tank of oil to be fired in the steam generating unit to demonstrate that the oil contains 0.5 weight percent sulfur or less. Thereafter, the owner or operator of the affected facility shall sample the oil in the fuel tank after each new shipment of oil is received, as described under §60.46c(d)(2).

(h) For affected facilities subject to §60.42c(h)(1), (2), or (3) where the owner or operator seeks to demonstrate compliance with the SO_2 standards based on fuel supplier certification, the performance test shall consist of the certification, the certification from the fuel supplier, as described under §60.48c(f), as applicable.

(i) The owner or operator of an affected facility seeking to demonstrate compliance with the SO_2 standards under §60.42c(c)(2) shall demonstrate the maximum design heat input capacity of the steam generating unit by operating the steam generating unit at this capacity for 24 hours. This demonstration shall be made during the initial performance test, and a subsequent demonstration may be requested at any other time. If the demonstrated 24-hour average firing rate for the

affected facility is less than the maximum design heat input capacity stated by the manufacturer of the affected facility, the demonstrated 24-hour average firing rate shall be used to determine the annual capacity factor for the affected facility; otherwise, the maximum design heat input capacity provided by the manufacturer shall be used.

(j) The owner or operator of an affected facility shall use all valid SO_2 emissions data in calculating $\%P_s$ and E_{ho} under paragraphs (d), (e), or (f) of this section, as applicable, whether or not the minimum emissions data requirements under §60.46c(f) are achieved. All valid emissions data, including valid data collected during periods of startup, shutdown, and malfunction, shall be used in calculating $\%P_s$ or E_{ho} pursuant to paragraphs (d), (e), or (f) of this section, as applicable.

§ 60.45c Compliance and performance test methods and procedures for particulate matter.

(a) The owner or operator of an affected facility subject to the PM and/or opacity standards under §60.43c shall conduct an initial performance test as required under §60.8, and shall conduct subsequent performance tests as requested by the Administrator, to determine compliance with the standards using the following procedures and reference methods, except as specified in paragraph (c) of this section.

(1) Method 1 of appendix A of this part shall be used to select the sampling site and the number of traverse sampling points.

(2) Method 3 of appendix A of this part shall be used for gas analysis when applying Method 5, 5B, or 17 of appendix A of this part.

(3) Method 5, 5B, or 17 of appendix A of this part shall be used to measure the concentration of PM as follows:

(i) Method 5 of appendix A of this part may be used only at affected facilities without wet scrubber systems.

(ii) Method 17 of appendix A of this part may be used at affected facilities with or without wet scrubber systems provided the stack gas temperature does not exceed a temperature of 160 °C (320 °F). The procedures of Sections 8.1 and 11.1 of Method 5B of appendix A of this part may be used in Method 17 of appendix A of this part only if Method 17 of appendix A of this part is used in conjunction with a wet scrubber system. Method 17 of appendix A of this part shall not be used in conjunction with a wet scrubber system if the effluent is saturated or laden with water droplets.

(iii) Method 5B of appendix A of this part may be used in conjunction with a wet scrubber system.

(4) The sampling time for each run shall be at least 120 minutes and the minimum sampling volume shall be 1.7 dry standard cubic meters (dscm) [60 dry standard cubic feet (dscf)] except that smaller sampling times or volumes may be approved by the Administrator when necessitated by process variables or other factors.

(5) For Method 5 or 5B of appendix A of this part, the temperature of the sample gas in the probe and filter holder shall be monitored and maintained at 160 ±14 °C (320±25 °F).

(6) For determination of PM emissions, an oxygen (O_2) or carbon dioxide (CO_2) measurement shall be obtained simultaneously with each run of Method 5, 5B, or 17 of appendix A of this part by traversing the duct at the same sampling location.

(7) For each run using Method 5, 5B, or 17 of appendix A of this part, the emission rates expressed in ng/J (lb/MMBtu) heat input shall be determined using:

(i) The O_2 or CO_2 measurements and PM measurements obtained under this section,

(ii) The dry basis F factor, and

(iii) The dry basis emission rate calculation procedure contained in Method 19 of appendix A of this part.

(8) Method 9 of appendix A of this part (6-minute average of 24 observations) shall be used for determining the opacity of stack emissions.

(b) The owner or operator of an affected facility seeking to demonstrate compliance with the PM standards under §60.43c(b)(2) shall demonstrate the maximum design heat input capacity of the steam generating unit by operating the steam generating unit at this capacity for 24 hours. This demonstration shall be made during the initial performance test, and a subsequent demonstration may be requested at any other time. If the demonstrated 24-hour average firing rate for the affected facility is less than the maximum design heat input capacity stated by the manufacturer of the affected facility, the demonstrated 24-hour average firing rate shall be used to determine the annual capacity factor for the affected facility; otherwise, the maximum design heat input capacity provided by the manufacturer shall be used.

(c) In place of PM testing with EPA Reference Method 5, 5B, or 17 of appendix A of this part, an owner or operator may elect to install, calibrate, maintain, and operate a CEMS for monitoring PM emissions discharged to the atmosphere and record the output of the system. The owner or operator of an affected facility who elects to continuously monitor PM emissions instead of conducting performance testing using EPA Method 5, 5B, or 17 of appendix A of this part shall install, calibrate, maintain, and operate a CEMS and shall comply with the requirements specified in paragraphs (c)(1) through (c)(13) of this section.

(1) Notify the Administrator 1 month before starting use of the system.

(2) Notify the Administrator 1 month before stopping use of the system.

(3) The monitor shall be installed, evaluated, and operated in accordance with §60.13 of subpart A of this part.

(4) The initial performance evaluation shall be completed no later than 180 days after the date of initial startup of the affected facility, as specified under §60.8 of subpart A of this part or within 180 days of notification to the Administrator of use of CEMS if the owner or operator was previously determining compliance by Method 5, 5B, or 17 of appendix A of this part performance tests, whichever is later.

(5) The owner or operator of an affected facility shall conduct an initial performance test for PM emissions as required under §60.8 of subpart A of this part. Compliance with the PM emission limit shall be determined by using the CEMS specified in paragraph (d) of this section to measure PM and calculating a 24-hour block arithmetic average emission concentration using EPA Reference Method 19 of appendix A of this part, section 4.1.

(6) Compliance with the PM emission limit shall be determined based on the 24-hour daily (block) average of the hourly arithmetic average emission concentrations using CEMS outlet data.

(7) At a minimum, valid CEMS hourly averages shall be obtained as specified in paragraph (d)(7)(i) of this section for 75 percent of the total operating hours per 30-day rolling average.

(i) At least two data points per hour shall be used to calculate each 1-hour arithmetic average.

(ii) [Reserved]

(8) The 1-hour arithmetic averages required under paragraph (d)(7) of this section shall be expressed in ng/J or lb/MMBtu heat input and shall be used to calculate the boiler operating day daily arithmetic average emission concentrations. The 1-hour arithmetic averages shall be calculated using the data points required under §60.13(e)(2) of subpart A of this part.

(9) All valid CEMS data shall be used in calculating average emission concentrations even if the minimum CEMS data requirements of paragraph (d)(7) of this section are not met.

(10) The CEMS shall be operated according to Performance Specification 11 in appendix B of this part.

(11) During the correlation testing runs of the CEMS required by Performance Specification 11 in appendix B of this part, PM and O_2 (or CO_2) data shall be collected concurrently (or within a 30- to 60-minute period) by both the continuous emission monitors and the test methods specified in paragraph (d)(7)(i) of this section.

(i) For PM, EPA Reference Method 5, 5B, or 17 of appendix A of this part shall be used.

(ii) For O_2 (or CO_2), EPA reference Method 3, 3A, or 3B of appendix A of this part, as applicable shall be used.

(12) Quarterly accuracy determinations and daily calibration drift tests shall be performed in accordance with procedure 2 in appendix F of this part. Relative Response Audit's must be performed annually and Response Correlation Audits must be performed every 3 years.

(13) When PM emissions data are not obtained because of CEMS breakdowns, repairs, calibration checks, and zero and span adjustments, emissions data shall be obtained by using other monitoring systems as approved by the Administrator or EPA Reference Method 19 of appendix A of this part to provide, as necessary, valid emissions data for a minimum of 75 percent of total operating hours on a 30-day rolling average.

(d) The owner or operator of an affected facility seeking to demonstrate compliance under §60.43c(e)(4) shall follow the applicable procedures under §60.48c(f). For residual oil-fired affected facilities, fuel supplier certifications are only allowed for facilities with heat input capacities between 2.9 and 8.7 MW (10 to 30 MMBtu/hr).

§ 60.46c Emission monitoring for sulfur dioxide.

(a) Except as provided in paragraphs (d) and (e) of this section, the owner or operator of an affected facility subject to the SO_2 emission limits under §60.42c shall install, calibrate, maintain, and operate a CEMS for measuring SO_2 concentrations and either O_2 or CO_2 concentrations at the outlet of the SO_2 control device (or the outlet of the steam generating unit if no SO_2 control device is used), and shall record the output of the system. The owner or operator of an affected facility subject to the percent reduction requirements under §60.42c shall measure SO_2 concentrations and either O_2 or CO_2 concentrations at both the inlet and outlet of the SO_2 control device.

(b) The 1-hour average SO_2 emission rates measured by a CEMS shall be expressed in ng/J or lb/MMBtu heat input and shall be used to calculate the average emission rates under §60.42c. Each 1-hour average SO_2 emission rate must be based on at least 30 minutes of operation, and shall be calculated using the data points required under §60.13(h)(2). Hourly SO_2 emission rates are not calculated if the affected facility is operated less than 30 minutes in a 1-hour period and are not counted toward determination of a steam generating unit operating day.

(c) The procedures under §60.13 shall be followed for installation, evaluation, and operation of the CEMS.

(1) All CEMS shall be operated in accordance with the applicable procedures under Performance Specifications 1, 2, and 3 of appendix B of this part.

(2) Quarterly accuracy determinations and daily calibration drift tests shall be performed in accordance with Procedure 1 of appendix F of this part.

(3) For affected facilities subject to the percent reduction requirements under §60.42c, the span value of the SO_2 CEMS at the inlet to the SO_2 control device shall be 125 percent of the maximum estimated hourly potential SO_2 emission rate of the fuel combusted, and the span value of the SO_2 CEMS at the outlet from the SO_2 control device shall be 50 percent of the maximum estimated hourly potential SO_2 emission rate of the fuel combusted.

(4) For affected facilities that are not subject to the percent reduction requirements of §60.42c, the span value of the SO_2 CEMS at the outlet from the SO_2 control device (or outlet of the steam generating unit if no SO_2 control device is used) shall be 125 percent of the maximum estimated hourly potential SO_2 emission rate of the fuel combusted.

(d) As an alternative to operating a CEMS at the inlet to the SO_2 control device (or outlet of the steam generating unit if no SO_2 control device is used) as required under paragraph (a) of this section, an owner or operator may elect to determine the average SO_2 emission rate by sampling the fuel prior to combustion. As an alternative to operating a CEMS at the outlet from the SO_2 control device (or outlet of the steam generating unit if no SO_2 control device is used) as required under paragraph (a) of this section, an owner or operator may elect to determine the average SO_2 emission rate by using Method 6B of appendix A of this part. Fuel sampling shall be conducted pursuant to either paragraph (d)(1) or (d)(2) of this section. Method 6B of appendix A of this part shall be conducted pursuant to paragraph (d)(3) of this section.

(1) For affected facilities combusting coal or oil, coal or oil samples shall be collected daily in an as-fired condition at the inlet to the steam generating unit and analyzed for sulfur content and heat content according the Method 19 of appendix A of this part. Method 19 of appendix A of this part provides procedures for converting these measurements into the format to be used in calculating the average SO_2 input rate.

(2) As an alternative fuel sampling procedure for affected facilities combusting oil, oil samples may be collected from the fuel tank for each steam generating unit immediately after the fuel tank is filled and before any oil is combusted. The owner or operator of the affected facility shall analyze the oil sample to determine the sulfur content of the oil. If a partially empty fuel tank is refilled, a new sample and analysis of the fuel in the tank would be required upon filling. Results of the fuel analysis taken after each new shipment of oil is received shall be used as the daily value when calculating the 30-day rolling average until the next shipment is received. If the fuel analysis shows that the sulfur content in the fuel tank is greater than 0.5 weight percent sulfur, the owner or operator shall ensure that the sulfur content of subsequent oil shipments is low enough to cause the 30-day rolling average sulfur content to be 0.5 weight percent sulfur or less.

(3) Method 6B of appendix A of this part may be used in lieu of CEMS to measure SO_2 at the inlet or outlet of the SO_2 control system. An initial stratification test is required to verify the adequacy of the Method 6B of appendix A of this part sampling location. The stratification test shall consist of three paired runs of a suitable SO_2 and CO_2 measurement train operated at the candidate location and a second similar train operated according to the procedures in §3.2 and the applicable procedures in section 7 of Performance Specification 2 of appendix B of this part. Method 6B of appendix A of this part, Method 6A of appendix A of this part, or a combination of Methods 6 and 3 of appendix A of this part or Methods 6C and 3A of appendix A of this part are suitable measurement techniques. If Method 6B of appendix A of this part is used for the second train, sampling time and timer operation may be adjusted for the stratification test as long as an adequate sample volume is collected; however, both sampling trains are to be operated

similarly. For the location to be adequate for Method 6B of appendix A of this part 24-hour tests, the mean of the absolute difference between the three paired runs must be less than 10 percent (0.10).

(e) The monitoring requirements of paragraphs (a) and (d) of this section shall not apply to affected facilities subject to §60.42c(h) (1), (2), or (3) where the owner or operator of the affected facility seeks to demonstrate compliance with the SO_2 standards based on fuel supplier certification, as described under §60.48c(f), as applicable.

(f) The owner or operator of an affected facility operating a CEMS pursuant to paragraph (a) of this section, or conducting as-fired fuel sampling pursuant to paragraph (d)(1) of this section, shall obtain emission data for at least 75 percent of the operating hours in at least 22 out of 30 successive steam generating unit operating days. If this minimum data requirement is not met with a single monitoring system, the owner or operator of the affected facility shall supplement the emission data with data collected with other monitoring systems as approved by the Administrator.

§ 60.47c Emission monitoring for particulate matter.

(a) Except as provided in paragraphs (c), (d), (e), and (f) of this section, the owner or operator of an affected facility combusting coal, oil, or wood that is subject to the opacity standards under §60.43c shall install, calibrate, maintain, and operate a COMS for measuring the opacity of the emissions discharged to the atmosphere and record the output of the system.

(b) All COMS for measuring opacity shall be operated in accordance with the applicable procedures under Performance Specification 1 of appendix B of this part. The span value of the opacity COMS shall be between 60 and 80 percent.

(c) Affected facilities that burn only distillate oil that contains no more than 0.5 weight percent sulfur and/or liquid or gaseous fuels with potential sulfur dioxide emission rates of 26 ng/J (0.06 lb/MMBtu) heat input or less and that do not use a post-combustion technology to reduce SO_2 or PM emissions are not required to operate a CEMS for measuring opacity if they follow the applicable procedures under §60.48c(f).

(d) Owners or operators complying with the PM emission limit by using a PM CEMS monitor instead of monitoring opacity must calibrate, maintain, and operate a CEMS, and record the output of the system, for PM emissions discharged to the atmosphere as specified in §60.45c(d). The CEMS specified in paragraph §60.45c(d) shall be operated and data recorded during all periods of operation of the affected facility except for CEMS breakdowns and repairs. Data is recorded during calibration checks, and zero and span adjustments.

(e) An affected facility that does not use post-combustion technology (except a wet scrubber) for reducing PM, SO_2, or carbon monoxide (CO) emissions, burns only gaseous fuels or fuel oils that contain less than or equal to 0.5 weight percent sulfur, and is operated such that emissions of CO to the atmosphere from the affected facility are maintained at levels less than or equal to 0.15 lb/MMBtu on a boiler operating day average basis is not required to operate a COMS for measuring opacity. Owners and operators of affected facilities electing to comply with this paragraph must demonstrate compliance according to the procedures specified in paragraphs (e)(1) through (4) of this section.

(1) You must monitor CO emissions using a CEMS according to the procedures specified in paragraphs (e)(1)(i) through (iv) of this section.

(i) The CO CEMS must be installed, certified, maintained, and operated according to the provisions in §60.58b(i)(3) of subpart Eb of this part.

(ii) Each 1-hour CO emissions average is calculated using the data points generated by the CO CEMS expressed in parts per million by volume corrected to 3 percent oxygen (dry basis).

(iii) At a minimum, valid 1-hour CO emissions averages must be obtained for at least 90 percent of the operating hours on a 30-day rolling average basis. At least two data points per hour must be used to calculate each 1-hour average.

(iv) Quarterly accuracy determinations and daily calibration drift tests for the CO CEMS must be performed in accordance with procedure 1 in appendix F of this part.

(2) You must calculate the 1-hour average CO emissions levels for each steam generating unit operating day by multiplying the average hourly CO output concentration measured by the CO CEMS times the corresponding average hourly flue gas flow rate and divided by the corresponding average hourly heat input to the affected source. The 24-hour average CO emission level is determined by calculating the arithmetic average of the hourly CO emission levels computed for each steam generating unit operating day.

(3) You must evaluate the preceding 24-hour average CO emission level each steam generating unit operating day excluding periods of affected source startup, shutdown, or malfunction. If the 24-hour average CO emission level is greater than 0.15 lb/MMBtu, you must initiate investigation of the relevant equipment and control systems within 24 hours of the first discovery of the high emission incident and, take the appropriate corrective action as soon as practicable to adjust control settings or repair equipment to reduce the 24-hour average CO emission level to 0.15 lb/MMBtu or less.

(4) You must record the CO measurements and calculations performed according to paragraph (e) of this section and any corrective actions taken. The record of corrective action taken must include the date and time during which the 24-hour average CO emission level was greater than 0.15 lb/MMBtu, and the date, time, and description of the corrective action.

(f) An affected facility that burns only gaseous fuels or fuel oils that contain less than or equal to 0.5 weight percent sulfur and operates according to a written site-specific monitoring plan approved by the appropriate delegated permitting authority is not required to operate a COMS for measuring opacity. This monitoring plan must include procedures and criteria for establishing and monitoring specific parameters for the affected facility indicative of compliance with the opacity standard.

§ 60.48c Reporting and recordkeeping requirements.

(a) The owner or operator of each affected facility shall submit notification of the date of construction or reconstruction and actual startup, as provided by §60.7 of this part. This notification shall include:

(1) The design heat input capacity of the affected facility and identification of fuels to be combusted in the affected facility.

(2) If applicable, a copy of any federally enforceable requirement that limits the annual capacity factor for any fuel or mixture of fuels under §60.42c, or §60.43c.

(3) The annual capacity factor at which the owner or operator anticipates operating the affected facility based on all fuels fired and based on each individual fuel fired.

(4) Notification if an emerging technology will be used for controlling SO_2 emissions. The Administrator will examine the description of the control device and will determine whether the technology qualifies as an emerging technology. In making this determination, the Administrator may require the owner or operator of the affected facility to submit additional information concerning the control device. The affected facility is subject to the provisions of §60.42c(a) or (b)(1), unless and until this determination is made by the Administrator.

(b) The owner or operator of each affected facility subject to the SO_2 emission limits of §60.42c, or the PM or opacity limits of §60.43c, shall submit to the Administrator the performance test data

from the initial and any subsequent performance tests and, if applicable, the performance evaluation of the CEMS and/or COMS using the applicable performance specifications in appendix B of this part.

(c) The owner or operator of each coal-fired, oil-fired, or wood-fired affected facility subject to the opacity limits under §60.43c(c) shall submit excess emission reports for any excess emissions from the affected facility that occur during the reporting period.

(d) The owner or operator of each affected facility subject to the SO_2 emission limits, fuel oil sulfur limits, or percent reduction requirements under §60.42c shall submit reports to the Administrator.

(e) The owner or operator of each affected facility subject to the SO_2 emission limits, fuel oil sulfur limits, or percent reduction requirements under §60.42c shall keep records and submit reports as required under paragraph (d) of this section, including the following information, as applicable.

(1) Calendar dates covered in the reporting period.

(2) Each 30-day average SO_2 emission rate (ng/J or lb/MMBtu), or 30-day average sulfur content (weight percent), calculated during the reporting period, ending with the last 30-day period; reasons for any noncompliance with the emission standards; and a description of corrective actions taken.

(3) Each 30-day average percent of potential SO_2 emission rate calculated during the reporting period, ending with the last 30-day period; reasons for any noncompliance with the emission standards; and a description of the corrective actions taken.

(4) Identification of any steam generating unit operating days for which SO_2 or diluent (O_2 or CO_2) data have not been obtained by an approved method for at least 75 percent of the operating hours; justification for not obtaining sufficient data; and a description of corrective actions taken.

(5) Identification of any times when emissions data have been excluded from the calculation of average emission rates; justification for excluding data; and a description of corrective actions taken if data have been excluded for periods other than those during which coal or oil were not combusted in the steam generating unit.

(6) Identification of the F factor used in calculations, method of determination, and type of fuel combusted.

(7) Identification of whether averages have been obtained based on CEMS rather than manual sampling methods.

(8) If a CEMS is used, identification of any times when the pollutant concentration exceeded the full span of the CEMS.

(9) If a CEMS is used, description of any modifications to the CEMS that could affect the ability of the CEMS to comply with Performance Specifications 2 or 3 of appendix B of this part.

(10) If a CEMS is used, results of daily CEMS drift tests and quarterly accuracy assessments as required under appendix F, Procedure 1 of this part.

(11) If fuel supplier certification is used to demonstrate compliance, records of fuel supplier certification is used to demonstrate compliance, records of fuel supplier certification as described under paragraph (f)(1), (2), (3), or (4) of this section, as applicable. In addition to records of fuel supplier certifications, the report shall include a certified statement signed by the owner or operator of the affected facility that the records of fuel supplier certifications submitted represent all of the fuel combusted during the reporting period.

(f) Fuel supplier certification shall include the following information:

(1) For distillate oil:

(i) The name of the oil supplier;

(ii) A statement from the oil supplier that the oil complies with the specifications under the definition of distillate oil in §60.41c; and

(iii) The sulfur content of the oil.

(2) For residual oil:

(i) The name of the oil supplier;

(ii) The location of the oil when the sample was drawn for analysis to determine the sulfur content of the oil, specifically including whether the oil was sampled as delivered to the affected facility, or whether the sample was drawn from oil in storage at the oil supplier's or oil refiner's facility, or other location;

(iii) The sulfur content of the oil from which the shipment came (or of the shipment itself); and

(iv) The method used to determine the sulfur content of the oil.

(3) For coal:

(i) The name of the coal supplier;

(ii) The location of the coal when the sample was collected for analysis to determine the properties of the coal, specifically including whether the coal was sampled as delivered to the affected facility or whether the sample was collected from coal in storage at the mine, at a coal preparation plant, at a coal supplier's facility, or at another location. The certification shall include the name of the coal mine (and coal seam), coal storage facility, or coal preparation plant (where the sample was collected);

(iii) The results of the analysis of the coal from which the shipment came (or of the shipment itself) including the sulfur content, moisture content, ash content, and heat content; and

(iv) The methods used to determine the properties of the coal.

(4) For other fuels:

(i) The name of the supplier of the fuel;

(ii) The potential sulfur emissions rate of the fuel in ng/J heat input; and

(iii) The method used to determine the potential sulfur emissions rate of the fuel.

(g) (1) Except as provided under paragraphs (g)(2) and (g)(3) of this section, the owner or

operator of each affected facility shall record and maintain records of the amount of each fuel combusted during each operating day.

(2) As an alternative to meeting the requirements of paragraph (g)(1) of this section, the owner or operator of an affected facility that combusts only natural gas, wood, fuels using fuel certification in §60.48c(f) to demonstrate compliance with the SO_2 standard, fuels not subject to an emissions standard (excluding opacity), or a mixture of these fuels may elect to record and maintain records of the amount of each fuel combusted during each calendar month.

(3) As an alternative to meeting the requirements of paragraph (g)(1) of this section, the owner or operator of an affected facility or multiple affected facilities located on a contiguous property unit where the only fuels combusted in any steam generating unit (including steam generating units not subject to this subpart) at that property are natural gas, wood, distillate oil meeting the most current requirements in §60.42C to use fuel certification to demonstrate compliance with the SO_2 standard, and/or fuels, excluding coal and residual oil, not subject to an emissions standard (excluding opacity) may elect to record and maintain records of the total amount of each steam generating unit fuel delivered to that property during each calendar month.

(h) The owner or operator of each affected facility subject to a federally enforceable requirement limiting the annual capacity factor for any fuel or mixture of fuels under §60.42c or §60.43c shall calculate the annual capacity factor individually for each fuel combusted. The annual capacity factor is determined on a 12-month rolling average basis with a new annual capacity factor calculated at the end of the calendar month.

(i) All records required under this section shall be maintained by the owner or operator of the affected facility for a period of two years following the date of such record.

(j) The reporting period for the reports required under this subpart is each six-month period. All reports shall be submitted to the Administrator and shall be postmarked by the 30th day following the end of the reporting period.

Indiana Department of Environmental Management
Office of Air Quality

Technical Support Document (TSD) for a Part 70 Minor Source Modification and a Significant Permit Modification

Source Description and Location

Source Name:	SABIC Innovative Plastics Mt. Vernon, LLC
Source Location:	1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
County:	Posey County
SIC Code:	2821
Operation Permit No.:	T 129-6794-00002
Operation Permit Issuance Date:	January 1, 2007
Minor Source Modification No.:	129-26621-00002
Significant Permit Modification No.:	129-26650-00002
Permit Reviewer:	David J. Matousek

Existing Approvals

The source was issued Part 70 Operating Permit No. T129-6794-00002 on January 1, 2007. The source has since received the following approvals:

(a) First Administrative Amendment No. 129-25275-00002, issued on November 21, 2007; and

(b) Second Administrative Amendment No. 129-25737-00002, issued on February 5, 2008.

County Attainment Status

The source is located in Posey County.

Pollutant	Designation
SO_2	Better than national standards.
CO	Unclassifiable or attainment effective November 15, 1990.
O_3	Unclassifiable or attainment effective June 15, 2004, for the 8-hour ozone standard.[1]
PM_{10}	Unclassifiable effective November 15, 1990.
NO_2	Cannot be classified or better than national standards.
Pb	Not designated.
[1]Unclassifiable or attainment effective October 18, 2000, for the 1-hour ozone standard which was revoked effective June 15, 2005. Unclassifiable or attainment effective April 5, 2005, for PM2.5.	

(a) Ozone Standards

(1) On October 25, 2006, the Indiana Air Pollution Control Board finalized a rule revision to 326 IAC 1-4-1 revoking the one-hour ozone standard in Indiana.

(2) On September 6, 2007, the Indiana Air Pollution Control Board finalized a temporary emergency rule to re-designate Allen, Clark, Elkhart, Floyd, LaPorte, and St. Joseph as attainment for the 8-hour ozone standard.

(3) On November 9, 2007, the Indiana Air Pollution Control Board finalized a temporary emergency rule to re-designate Boone, Clark, Elkhart, Floyd, LaPorte, Hamilton, Hancock, Hendricks, Johnson, Madison, Marion, Morgan, Shelby, and St. Joseph as attainment for the 8-hour ozone standard.

(4) Volatile organic compounds (VOC) and Nitrogen Oxides (NOx) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NOx emissions are considered when evaluating the rule applicability relating to ozone. Posey County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

(b) PM2.5
Posey County has been classified as attainment for PM2.5. On May 8, 2008 U.S. EPA promulgated the requirements for Prevention of Significant Deterioration (PSD) for PM2.5 emissions, and the effective date of these rules was July 15, 2008. Indiana has three years from the publication of these rules to revise its PSD rules, 326 IAC 2-2, to include those requirements. The May 8, 2008 rule revisions require IDEM to regulate PM10 emissions as a surrogate for PM2.5 emissions until 326 IAC 2-2 is revised.

(c) Other Criteria Pollutants
Posey County has been classified as attainment or unclassifiable in Indiana for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

(d) Since this source contains fossil fuel boilers (or combinations thereof) totaling more than two hundred fifty million (250,000,000) British thermal units per hour heat input, it is considered one of the twenty-eight (28) listed source categories, as specified in 326 IAC 2-2-1(gg)(1).

(e) Fugitive Emissions
Since this type of operation is in one of the twenty-eight (28) listed source categories under 326 IAC 2-2 or 326 IAC 2-3, fugitive emissions are counted toward the determination of PSD and Emission Offset applicability.

Source Status

The table below summarizes the potential to emit of the entire source, prior to the proposed modification, after consideration of all enforceable limits established in the effective permits:

Pollutant	**Emissions** (ton/yr)
PM	> 100
PM_{10}	> 100
SO_2	> 100
VOC	> 100
CO	> 100
NO_X	> 100

(a) This existing source is a major stationary source, under PSD (326 IAC 2-2), because a regulated pollutant is emitted at a rate of 100 tons per year or more, and it is one of the twenty-eight (28) listed source categories, as specified in 326 IAC 2-2-1(gg)(1).

(b) These emissions are based on the 2006 emission inventory report provided by the source.

The table below summarizes the potential to emit HAPs for the entire source, prior to the proposed modification, after consideration of all enforceable limits established in the effective permits:

HAPs	**Potential To Emit** (ton/yr)
Single	> 10.0
Total	> 25.0

This existing source is a major source of HAPs, as defined in 40 CFR 63.41, because HAP emissions are greater than ten (10) tons per year for a single HAP and greater than twenty-five (25) tons per year for a combination of HAPs. Therefore, this source is a major source under Section 112 of the Clean Air Act (CAA).

Actual Emissions

The following table shows the actual emissions from the source. This information reflects the 2006 OAQ emission data.

Pollutant	**Actual Emissions** (ton/yr)
PM_{10}	119.6
$PM_{2.5}$	55.4
SO_2	7,169.0
VOC	350.0
CO	459.0
NO_X	2,535.0
HAP	not reported
Total HAPs	not reported

Description of Proposed Modification

The Office of Air Quality (OAQ) has reviewed a modification application, submitted by SABIC Innovative Plastics Mt. Vernon, LLC on May 29, 2008, relating to the removal of coating Line 16 from the source. SABIC Innovative Plastics Mt. Vernon, LLC also applied to allow the use of a temporary natural gas / fuel oil-fired boiler, rated at a maximum 10.468 MMBtu/hr, and two temporary emergency generators, each rated at 2,332 Hp each. In addition, the source requested a permit modification to incorporate the requirements of 40 CFR Part 63, Subpart PPPP into the existing Part 70 Operating permit. Finally, the source requested minor changes in existing recordkeeping and equipment descriptive information.

The temporary boiler and emergency generators are being added to the source to provide steam and electrical power during periods of turn-arounds and outages. The boiler and generators are portable units and will not be permanent installations. SABIC Innovative Plastics Mt. Vernon, LLC intends to use rental equipment on an as-needed basis. The source provided "worst case" emission calculations based on the maximum heat input capacity or generator horsepower. The source requested a minor limit to keep the installation of the boiler under the significant source modification threshold.

(a) Two (2) emergency generators, approved for temporary installations in 2008, identified as 17-500 and 17-501, with a maximum continuous power of 2,332 BHp (15.22 MMBtu/hr), using no control equipment, and exhausting to stacks 17-500 and 17-501.

(b) One (1) temporary natural gas / No. 2 fuel oil-fired boiler, approved for temporary installations in 2008, identified as TEMPBOILER, with a maximum heat input capacity of 10.468 MMBtu/hr, using no control, and exhausting to stack 10-500.

The following emission unit is no longer in use and has been removed from the source.

(a) Plastic sheet coating line, identified as Line 16.

The following emission unit descriptions have been updated to reflect actual operation or to correct typographical errors:

(a) The descriptive information for BW-Boiler has been revised to remove all references to fuel oil. BW-Boiler has not operated on fuel oil in several years and the equipment necessary to operate on fuel oil is no longer functioning. The heat input capacity has been reduced from 193 MMBtu/hr to 178.5 MMBtu/hr to reflect operation on natural gas alone.

(b) The descriptive information for R Boiler has been revised to show a reduction in the heat input capacity from 192.4 MMBtu/hr to 178.5 MMBtu/hr. In addition, the year of construction is 1969 and not 1962.

Enforcement Issues

There are no pending enforcement actions.

Stack Summary

Stack ID	Operation	Height (ft)	Diameter (ft)	Flow Rate (acfm)	Temperature (^{0}F)
10-500	TEMPBOILER	16.5	1.2	3500	500
07-500	Emergency Generator 17-500	27.0	3.3	16,000	500
07-501	Emergency Generator 17-501	27.0	3.3	16,000	500

Emission Calculations

See Appendix A of this Technical Support Document for detailed emission calculations.

Permit Level Determination – Part 70

Pursuant to 326 IAC 2-1.1-1(16), Potential to Emit is defined as “the maximum capacity of a stationary source or emission unit to emit any air pollutant under its physical and operational design. Any physical or operational limitation on the capacity of a source to emit an air pollutant, including air pollution control equipment and restrictions on hours of operation or type or amount of material combusted, stored, or processed shall be treated as part of its design if the limitation is enforceable by the U. S. EPA, IDEM, or the appropriate local air pollution control agency.”

The following table is used to determine the appropriate permit level under 326 IAC 2-7-10.5. This table reflects the PTE before controls. Control equipment is not considered federally enforceable until it has been required in a federally enforceable permit.

PTE Before Controls or Operating Restrictions of the Modification	
Pollutant	**Potential To Emit** (ton/yr)
PM	2.47
PM_{10}	2.47
SO_2	2.75
VOC	0.59
CO	7.80
NO_X	30.22

This source modification is subject to 326 IAC 2-7-10.5(d)(4)(B), because this is a modification for which the potential to emit is limited to less than twenty-five (25) tons per year of any regulated pollutant by limiting the hours of operation of a process. In this case, the hours of operation of the temporary boiler has been limited to less than 1,500 hours per year.

Additionally, the modification will be incorporated into the Part 70 Operating Permit through a significant permit modification issued pursuant to 326 IAC 2-7-12(d), because the modification requires a case-by-case determination of an emission limitation or other standard.

Permit Level Determination – PSD or Emission Offset

The table below summarizes the potential to emit, reflecting all limits, of the emission units. Any control equipment is considered federally enforceable only after issuance of this Part 70 significant permit modification, and only to the extent that the effect of the control equipment is made practically enforceable in the permit.

	Potential to Emit (ton/yr)					
Process / Emission Unit	**PM**	**PM_{10} / $PM_{2.5}$**	**SO_2**	**VOC**	**CO**	**NO_X**
TEMPBOILER	0.39	0.39	0.40	0.04	1.20	1.96
Emergency Generator 17-500	0.09	0.09	0.21	0.17	0.39	9.38
Emergency Generator 17-501	0.09	0.09	0.21	0.17	0.39	9.38
Total for Modification	0.57	0.57	0.82	0.38	1.98	20.72
Significant Level	25.00	15.00	40.00	40.00	100.00	40.00

This modification to an existing major stationary source is not major because the emissions increases are less than the PSD significant levels. Therefore, pursuant to 326 IAC 2-2, the PSD requirements do not apply.

Federal Rule Applicability Determination

The following federal rules are applicable to the source due to this modification:

NSPS:

(a) The temporary natural gas / No. 2 fuel oil-fired boiler is subject to the New Source Performance Standards for Small Industrial-Commercial-Institutional Steam Generating Units (40 CFR 60.40c, Subpart Dc), which is incorporated by reference as 326 IAC 12. The units subject to this rule include the following:

(1) One (1) temporary natural gas / No. 2 fuel oil-fired boiler, approved for construction in 2008, identified as TEMPBOILER, with a maximum heat input capacity of 10.468 MMBtu/hr, using no control, and exhausting to stack 10-500.

Nonapplicable portions of the NSPS will not be included in the permit. TEMPBOILER is subject to the following portions of Subpart Dc:

1) 60.40c(a)
2) 60.40c(b)
3) 60.41c
4) 60.42c(d)
5) 60.42c(h)
6) 60.42c(h)(1)
7) 60.42c(h)(2)
8) 60.42c(i)
9) 60.44c(h)
10) 60.46c(e)
11) 60.48c(a)
12) 60.48c(a)(1)
13) 60.48c(a)(2)
14) 60.48c(a)(3)
15) 60.48c(a)(4)
16) 60.48c(d)
17) 60.48c(e)(1)
18) 60.48c(e)(2)
19) 60.48c(e)(3)
20) 60.48c(e)(4)
21) 60.48c(e)(5)
22) 60.48c(e)(6)
23) 60.48c(e)(7)
24) 60.48c(e)(8)
25) 60.48c(e)(9)
26) 60.48c(e)(10)
27) 60.48c(e)(11)
28) 60.48c(f)(1)
29) 60.48c(f)(1)(i)
30) 60.48c(f)(1)(ii)
31) 60.48c(f)(1)(iii)
32) 60.48c(f)(2)
33) 60.48c(f)(2)(i)
34) 60.48c(f)(2)(ii)
35) 60.48c(f)(2)(iii)
36) 60.48c(f)(2)(iv)
37) 60.48c(g)(1)
38) 60.48c(g)(2)
39) 60.48c(g)(3)
40) 60.48c(i)
41) 60.48c(j)

(b) The emergency generators are not subject to the New Source Performance Standards for Stationary Compression Ignition Internal Combustion Engines (40 CFR Part 60, Subpart IIII), because they are not stationary compression ignition internal combustion engines. The emergency generators are classified as nonroad engines in accordance with 40 CFR 1068.30. They are nonroad engines because they are portable or transferable and will remain on the site for less than twelve consecutive months.

(c) The emergency generators are not subject to the New Source Performance Standards for Stationary Spark Ignition Internal Combustion Engines (40 CFR Part 60, Subpart JJJJ), because the emergency generators are compression ignition sources and are classified as nonroad engines in accordance with 40 CFR 1068.30.

NESHAP:

(d) Sp-PPPC is subject to the National Emission Standards for Hazardous Air Pollutants: Surface Coating of Plastic Parts and Products (40 CFR 63.4480, Subpart PPPP), which is incorporated by reference as 326 IAC 20-81-1. The facilities subject to this rule include the following:

Sp-PPPC, which consists of the following:

1) All coating operations as defined in 40 CFR 63.4581 (plastic coating lines identified in Section L.2 of this permit as C-41 and C-42 are included in this affected souce);

2) All storage containers and mixing vessels in which coatings, thinners, and/or other additives, and cleaning materials are stored or mixed;

3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and

4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation;

Nonapplicable portions of the NESHAP will not be included in the permit. Sp-PPPC is subject to the following portions of Subpart PPPP:

1) 63.4480
2) 63.4481(a)
3) 63.4481(a)(1)
4) 63.4481(a)(2)
5) 63.4481(b)
6) 63.4481(c)
7) 63.4481(c)(1)
8) 63.4481(c)(2)
9) 63.4481(c)(4)
10) 63.4481(c)(14)
11) 63.4481(e)
12) 63.4481(e)(1)
13) 63.4482(a)
14) 63.4482(b)
15) 63.4482(b)(1)
16) 63.4482(b)(2)
17) 63.4482(b)(3)
18) 63.4482(b)(4)
19) 63.4482(e)
20) 63.4483
21) 63.4483(b)
22) 63.4483(d)
23) 63.4490(b)
24) 63.4490(b)(1)
25) 63.4491
26) 63.4491(a)
27) 63.4492(a)
28) 63.4493(a)

29) 63.4500(a)
30) 63.4500(a)(1)
31) 63.4500(b)
32) 63.4501
33) 63.4510(a)
34) 63.4510(b)
35) 63.4510(c)
36) 63.4510(c)(1)
37) 63.4510(c)(2)
38) 63.4510(c)(3)
39) 63.4510(c)(4)
40) 63.4510(c)(5)
41) 63.4510(c)(6)
42) 63.4510(c)(6)(i)
43) 63.4510(c)(6)(ii)
44) 63.4510(c)(7)
45) 63.4510(c)(7)(i)
46) 63.4510(c)(7)(ii)
47) 63.4510(c)(7)(iii)
48) 63.4510(c)(7)(iv)
49) 63.4510(c)(8)
50) 63.4510(c)(8)(i)
51) 63.4520(a)
52) 63.4520(a)(1)
53) 63.4520(a)(1)(i)
54) 63.4520(a)(1)(ii)
55) 63.4520(a)(1)(iii)
56) 63.4520(a)(1)(iv)
57) 63.4520(a)(2)
58) 63.4520(a)(3)
59) 63.4520(a)(3)(i)
60) 63.4520(a)(3)(ii)
61) 63.4520(a)(3)(iii)
62) 63.4520(a)(3)(iv)
63) 63.4520(a)(4)
64) 63.4520(a)(5)
65) 63.4520(a)(5)(i)
66) 63.4520(a)(5)(ii)
67) 63.4520(a)(5)(iii)
68) 63.4520(a)(5)(iv)
69) 63.4530
70) 63.4530(a)
71) 63.4530(b)
72) 63.4530(c)
73) 63.4530(c)(1)
74) 63.4530(c)(2)
75) 63.4530(d)
76) 63.4530(e)
77) 63.4530(f)
78) 63.4530(h)
79) 63.4531(a)
80) 63.4531(b)
81) 63.4531(c)
82) 63.4540
83) 63.4541
84) 63.4541(a)
85) 63.4541(a)(1)
86) 63.4541(a)(1)(i)

87) 63.4541(a)(1)(ii)
88) 63.4541(a)(2)
89) 63.4541(a)(3)
90) 63.4541(a)(4)
91) 63.4541(a)(5)
92) 63.4541(b)
93) 63.4541(b)(1)
94) 63.4541(b)(2)
95) 63.4541(b)(3)
96) 63.4541(c)
97) 63.4541(d)
98) 63.4542(a)
99) 63.4542(b)
100) 63.4542(c)
101) 63.4542(d)
102) 63.4550
103) 63.4580(a)
104) 63.4580(b)
105) 63.4580(c)
106) 63.4580(c)(1)
107) 63.4580(c)(2)
108) 63.4580(c)(3)
109) 63.4580(c)(4)
110) 63.4581
111) Table 2 to Subpart PPPP
112) Table 3 to Subpart PPPP
113) Table 4 to Subpart PPPP
114) Appendix A to Subpart PPPP

The provisions of 40 CFR 63 Subpart A – General Provisions, which are incorporated as 326 IAC 20-1-1, apply to the facility described in this section except when otherwise specified in 40 CFR 63 Subpart PPPP.

(e) The emergency generators are not subject to the National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines (40 CFR Part 63, Subpart ZZZZ), because the emergency generators are classified as nonroad engines in accordance with 40 CFR 1068.30. They are nonroad engines because they are portable or transferable and will remain on the site for less than twelve consecutive months.

State Rule Applicability Determination

The following state rules are applicable to the source due to the modification:

326 IAC 2-2 and 2-3 (PSD and Emission Offset)
This modification to an existing major stationary source is not major because the emissions increases are less than the PSD significant levels. Therefore, pursuant to 326 IAC 2-2, the PSD requirements do not apply.

326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating)
One (1) natural gas / No.2 fuel oil-fired boiler, identified as TEMPBOILER, which is considered a source of indirect heat, will be constructed after September 21, 1983. Therefore, this boiler is subject to the requirements of 326 IAC 6-2-4 and shall comply with the following emission limit:

The PM emissions from the boiler, identified as TEMPBOILER, shall not exceed 0.146 pounds per million Btu heat input (lb/MMBtu). This limitation was calculated using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

Where
Q = total source heat input capacity (MMBtu/hr)
For this unit, Q = 2,308.97 MMBtu/hr.

Compliance Determination and Monitoring Requirements

Permits issued under 326 IAC 2-7 are required to ensure that sources can demonstrate compliance with all applicable state and federal rules on a continuous basis. All state and federal rules contain compliance provisions; however, these provisions do not always fulfill the requirement for a continuous demonstration. When this occurs, IDEM, OAQ, in conjunction with the source, must develop specific conditions to satisfy 326 IAC 2-7-5. As a result, Compliance Determination Requirements are included in the permit. The Compliance Determination Requirements in Section D-U of the permit are those conditions that are found directly within state and federal rules and the violation of which serves as grounds for enforcement action.

If the Compliance Determination Requirements are not sufficient to demonstrate continuous compliance, they will be supplemented with Compliance Monitoring Requirements, also in Section D-U of the permit. Unlike Compliance Determination Requirements, failure to meet Compliance Monitoring conditions would serve as a trigger for corrective actions and not grounds for enforcement action. However, a violation in relation to a compliance monitoring condition will arise through a source's failure to take the appropriate corrective actions within a specific time period.

The following are new Compliance Determination Requirements applicable to this modification:

Emission Unit	Parameter	Frequency
BW-Boiler	PM Testing	Within 90 days of using BW-Boiler to control COS stream or SHEETFUMES / Repeat every 5 years.
R Boiler, E Boiler and L Boiler	PM Testing	Every 5 Years
Affected Source Sp-PPPC	Performance Testing (40 CFR 63, Subpart A)	In accordance with 63.7(a)(3), if required by EPA administrator
Affected Source Sp-PPPC	HAP content (40 CFR 63, 63.4490.(b)(1)	0.16 lb organic HAP per lb coating solids used during each 12-month compliance period.
TEMPBOILER	Sulfur Content	While burning fuel oil, the sulfur content shall not exceed 0.5 percent sulfur by weight as certified by fuel supplier.

The following are new Compliance Monitoring Requirements applicable to this modification:

Emission Unit	Parameter	Frequency
R Boiler and BW-Boiler	Visible Emissions Notations	Once per day during normal daylight operations when burning COS.

Proposed Changes

The changes listed below have been made to Part 70 Operating Permit No. T129-6794-00002. Deleted language appears as ~~strikethroughs~~ and new language appears in **bold**:

Change #1

All references to the zip code in the permit have been updated from 47620-9364 to 47620-9367. In addition, the table of contents has been updated to reflect the changes shown in this section.

Change #2

EMISSION UNIT DESCRIPTIONS: At the request of the applicant, the emission unit descriptions in Section A of the permit have been revised as follows:

1) The temporary boiler and the emergency generators have been added.

2) SHEETFUMES, Line 16 has been removed from the site and all references to Line 16 have been removed from the permit.

3) The emission unit description for BW-Boiler has been revised to remove all references to fuel oil. Boiler BW-Boiler has not operated on fuel oil in several years and the equipment necessary to operate on fuel oil will not be operated in the future. The heat input capacity has also been updated from 193 MMBtu/hr to 173 MMBtu/hr to reflect operation on natural gas with/without supplemental hydrogen. It is also no longer used to control emissions from Line 16 of SHEETFUMES.

4) The maximum capacity of R Boiler has been revised from 192.4 MMBtu/hr to 178.5 MMBtu/hr and the date of construction has been revised from 1962 to 1969.

Revision to Section A as a result of these modification follow below:

A.10 Boilerhouse I [Section K]

A.10.1 Boilerhouse I

<u>Boilerhouse I Affected Facilities/Sources</u>

(a) [Reserved]

<u>BH I Boilers</u>

(b) The boilers located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum heat input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit[(d)(e)]	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
09-001	BW-BOILER	B&W BOILER natural gas with/without supplemental hydrogen~~; or oil fired~~	None	None	~~193~~ **173** MMBtu/hr	1975
09-002	E BOILER	ERIE BOILER coal fired	BHI Baghouse	None	249 MMBtu/hr	1975
09-002	L BOILER	LASKER BOILER coal fired	BHI Baghouse	None	128.7 MMBtu/hr (design)	1962
09-002	V BOILER	VOGT BOILER coal fired	BHI Baghouse	None	51.3 MMBtu/hr (design)	1959
09-106	R BOILER	RILEY BOILER natural gas fired	None	None	~~192.4~~ **178.5** MMBtu/hr	1962~~9~~

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).

(b) Equipment is integral to the process operation.

(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(d) E Boiler, L Boiler, BW-Boiler, and R Boiler may be used for controlling organic sulfides from the COS stream. The COS stream is the regeneration gas stream created by carbon adsorbers used in the carbon monoxide generation/purification process; carbon monoxide is used in the LEXAN# production facility. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide. In addition to having the option to use the Erie Boiler, Lasker Boiler, B&W Boiler, or Riley Boiler for controlling these organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either an oxidizer (08-706) or flare (08-707). The oxidizer and flare are described in Section I of this permit. The flare (08-707) serves only as back-up to the oxidizer (08-706) and during safety interlock of the system.

(e) E Boiler, BW-Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream. The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S4~~,~~ **and** S5~~, and Line 16~~. The SHEETFUMES stream may be vented to either the E Boiler or R Boiler for control. ~~However, when line 16 is the only coating line operating, SHEETFUMES may be vented to the BW-Boiler.~~

…

A.11 Structured Products [Section L]

A.11.1 Structured Products, Building 4

…

<u>Structured Products Operations</u>

(c) The Structured Products operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001; 09-002; and 09-106	SHEETFUMES*	COATING LINES - C-41, C-42, S-4, S-5~~, Line 16~~	Boilers in Section K	None	N/A	N/A
10-086	OSFCA	C-45 FILM COATER	None	None	N/A	N/A
10-087	OSFCB		None	None	N/A	N/A
10-199	C42FMR	C-42 FMR COOLING ZONE	None	None	N/A	N/A
10-358	C7A	C7A PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-359	C7B	C7B PLASTIC FILM WEB COATING LINE	None	None	N/A	2005
10-360	C8	C8 PLASTIC FILM WEB COATING LINE	None	None	N/A	2006
10-361	C-6	C-6 COATING LINE	None	None	N/A	N/A

…

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
(b) Equipment is integral to the process operation.
(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
(d) Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, ~~Line 16,~~ S-4, and S-5. The boilers described in Section K of this permit~~, BW-Boiler~~, E Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream.~~ However, BW-Boiler may only be used for control when the Line 16 coating line is the only coating line operating.~~

Temporary Boiler

(d) The boiler listed below represents a temporary, portable steam generating unit for Structured Products. The stack/vent I.D.; emission unit I.D; emission unit description; maximum heat capacity; and date of construction are in the following table:

Significant Activities[a]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Maximum Capacity	Date of Construct
10-500	**TEMPBOILER**	**Small natural gas or No.2 fuel oil fired boiler**	**10.468 MMBtu/hr**	**N/A**

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))

…

A.18 Emergency Generators and Pumps [Section S]

…

Temporary Emergency Generators

(c) The generators listed below represent temporary, portable, emergency generators. Each emergency generator is individually identified with an affiliated stack/vent

I.D.; plant location; rated horsepower (hp); and heat input. Generator units may vary depending upon which units are available when needed.

Stack / Vent I.D	Emission Unit / Description	Plant Location	Maximum HP	Maximum Heat Input (MMBtu/hr)
17-500	**17-500 / Emergency Generator**	**AS NEEDED - Portable**	**2,332**	**15.22**
17-501	**17-501 / Emergency Generator**	**AS NEEDED - Portable**	**2,332**	**15.22**

Change #3

The facility description box in Section K.2 has modified to update the emission unit descriptions for R Boiler, BW-Boiler and to remove SHEETFUMES Line 16. The revised facility description box follows:

SECTION K.2 FACILITY OPERATION CONDITIONS

FACILITY DESCRIPTIONS: Boilerhouse I

BH I Boilers

(b) The boilers located in the Boilerhouse I Area are identified as emission units below. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum heat input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[a]

Stack / Vent I.D	Emission Unit[d][e]	Emission Unit Description	Air Pollution Control Devices	Integral Devices[b]	Maximum Capacity[c]	Date of Construct
09-001	BW-BOILER	B&W BOILER natural gas with/without supplemental hydrogen~~; or oil fired~~	None	None	~~193~~ **173** MMBtu/hr	1975
09-002	E BOILER	ERIE BOILER coal fired	BHI Baghouse	None	249 MMBtu/hr	1975
09-002	L BOILER	LASKER BOILER coal fired	BHI Baghouse	None	128.7 MMBtu/hr (design)	1962
09-002	V BOILER	VOGT BOILER coal fired	BHI Baghouse	None	51.3 MMBtu/hr (design)	1959
09-106	R BOILER	RILEY BOILER natural gas fired	None	None	~~192.4~~ **178.5** MMBtu/hr	196~~2~~**9**

(a) Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)).

(b) Equipment is integral to the process operation.

(c) When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.

(d) E Boiler, L Boiler, BW-Boiler, and R Boiler may be used for controlling organic sulfides from the COS stream. The COS stream is the regeneration gas stream created by carbon adsorbers used in the carbon monoxide generation/purification process; carbon monoxide is used in the LEXAN# production facility. Downstream of the adsorbers is a chromatograph (GC) that measures constituents in the CO process stream; the GC indicates when the adsorber should switch between the In-process or regeneration mode. When switched to the regeneration mode, organic sulfide impurities are removed from the carbon and become part of the regeneration gas stream known as the COS stream. The COS stream contains organic sulfides; which primarily consist of Carbonyl Sulfide, Hydrogen Sulfide, and Carbon Disulfide. In addition to having the option to use the Erie Boiler, Lasker Boiler, B&W Boiler, or Riley Boiler for controlling these organic sulfides from the COS stream, the Permittee is also authorized to feed the COS stream to either an oxidizer (08-706) or flare (08-707). The oxidizer and flare are described in Section I of this permit. The flare (08-707) serves only as back-up to the oxidizer (08-706) and during safety interlock of the system.

(e) E Boiler, BW-Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream. The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42, S4~~,~~ **and** S5~~, and Line 16~~. The SHEETFUMES stream may be vented to either the E Boiler or R Boiler for control. ~~However, when line 16 is the only coating line operating, SHEETFUMES may be vented to the BW-Boiler.~~

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Change #4

Original Condition K.2.3 is related to the operation of SHEETFUMES, Line 16. With the removal of Line 16, this condition is no longer required. Condition K.2.3 will remain in the permit as a placeholder condition. Modification to original Condition K.2.3 follows:

K.2.3 ~~Volatile Organic Compounds (VOC) from Line 16 SHEETFUMES [326 IAC 2-2]~~**[RESERVED]**

~~Pursuant to SSM 129-10709-0002, Condition D.1.1(b) and D.1.4, issued on July 22, 1999, as revised through the Title V permit, whenever a VOC-containing coating is being applied or VOC-containing solvent is being used in the Line 16 process and the VOC emissions are vented to any of the four (4) boilers identified as BW-BOILER, E BOILER, L BOILER, and R BOILER, such boiler(s) shall maintain a minimum overall control efficiency of 95% including capture and removal efficiencies. This control efficiency is required to limit the net emissions increase of VOC to less than 40 tons per 12 consecutive month period after the 1999 Line 16 construction.~~

~~Compliance with this Condition and the Line 16 production limitation as described in Condition L.2.1(b) is equivalent to 10.74 tons VOC emissions per twelve (12) consecutive month period and limits the net emissions increase of VOC to less than 40 tons per 12 consecutive month period after the 1999 Line 16 construction. Therefore, the requirements of 326 IAC 2-2, Prevention of Significant Deterioration are not applicable.~~

Change #5

Original Condition K.2.5(a) relates to the use of fuel oil in boiler BW-Boiler. This boiler can no longer burn fuel oil and the condition is obsolete. Original Condition K.2.5(a) will remain in the permit as a place holder condition. Modified Condition K.2.5 follows:

K.2.5 Sulfur Dioxide (SO_2) [326 IAC 7-1.1] ~~[40 CFR 52, Subpart P]~~

(a) ~~Pursuant to 326 IAC 7-1.1 and 40 CFR 52, Subpart P (Sulfur Dioxide Emission Limitations), the SO_2 emissions from the natural gas and oil fired boiler, identified as BW-BOILER shall each not exceed 1.6 pounds per million Btu (lbs/MMBtu) when combusting residual oil.~~**[RESERVED]**

(b) Pursuant to 326 IAC 7-1.1 ~~and 40 CFR 52, Subpart P~~ (Sulfur Dioxide Emission Limitations), the SO_2 emissions from the three (3) coal fired boilers, identified as E BOILER, L BOILER, and V BOILER shall each not exceed 6.0 pounds per million Btu (lbs/MMBtu).

Change #6

Original Condition K.2.9 relates to controlling VOC emissions from SHEETFUMES, Line 16. This condition is obsolete with the removal of SHEETFUMES, Line 16. The condition will remain as a place holder condition. Revisions to original Condition K.2.9 follow:

K.2.9 ~~Volatile Organic Compounds (VOC) from Line 16 [326 IAC 2-2]~~**[RESERVED]**

~~To determine compliance with K.2.3, each of the BW-BOILER, E BOILER, L BOILER, or R BOILER that is used for VOC control shall operate at all times when a VOC-containing coating is being applied or VOC-containing solvent is being used in the Line 16 plastic sheet coating facility as described in Section L of this permit.~~

Change #7

Original Condition K.2.11(a) relates to the use of fuel oil in boiler BW-Boiler. With the removal of fuel oil as a potential fuel, Condition K.2.11(a) is obsolete. Modifications to existing Condition K.2.11 follow:

K.2.11 Sulfur Dioxide Emissions and Sulfur Content [326 IAC 3] [326 IAC 7-2] [326 IAC 7-1.1-2]

(a) **[RESERVED]** ~~In order to demonstrate compliance with the SO_2 limits pursuant to Condition K.2.5(a), the Permittee shall demonstrate, using a calendar month average, that the sulfur dioxide emissions do not exceed the equivalent of one and six-tenths (1.6) pounds per MMBtu from the natural gas and oil fired boiler, identified as BW-BOILER when combusting oil. The Permittee may use one of the following methods pursuant to 326 IAC 7-2-1(c) and specified in 326 IAC 3-7-4:~~

~~(1) Determine pounds SO_2 per MMBtu based on vendor analysis of fuel delivered, if the vendor provides certification based upon sampling and analysis of the oil performed prior to delivery of the fuel, or;~~

~~(2) Analyzing the oil sample to determine the sulfur content of the oil via procedures authorized pursuant to 326 IAC 3-7-4 or 40 CFR 60, Appendix A, Method 19.~~

~~(A) Oil samples may be collected from the fuel tank immediately after the fuel tank is filled and before any oil is combusted; and~~

~~(B) If a partially empty fuel tank is refilled, a new sample and analysis would be required upon filling; or~~

~~(3) Compliance may also be determined by conducting a stack test for sulfur dioxide emissions from the one hundred and ninety-three (193) MMBtu per hour boiler, BW-BOILER, using 40 CFR 60, Appendix A, Method 6, 6A, 6C, or 8, as applicable, or other procedures approved by OAQ, in accordance with the procedures in 326 IAC 3-6.~~

...

Change #8

Condition K.2.12 has been modified to update the dates of testing required by original Conditions K.2.12(e) and K.2.12(g). In addition, IDEM has determined extending the time frame for testing PM for boilers R Boiler, E Boiler and L Boiler is justified. Therefore, the testing time frame has been changed to 5 years from 2.5 years. In addition, PM testing is only required on natural gas-fired boiler BW-Boiler when it is controlling process emissions. Proposed revisions to existing Condition K.2.12 follow:

K.2.12 Testing Requirements [326 IAC 2-7-6(1)] [326 IAC 2-1.1-11]

...

(e) **1)** ~~During the period between 24 and 30 months after issuance of this Part 70 permit~~**No later than June 30, 2009**, in order to demonstrate compliance with Condition K.2.4, the Permittee shall perform PM testing for ~~BW-BOILER and~~ R BOILER utilizing methods as approved by the Commissioner. This test shall be repeated at least once every ~~two and one half (2.5)~~ **five (5)** years from the date of this valid compliance demonstration. Testing shall be conducted in accordance with Section C- Performance Testing.

2) If the Permittee chooses to control emissions from the COS stream or SHEETFUMES using the BW-Boiler, PM testing shall be performed for BW-

Boiler utilizing methods as approved by the Commissioner. Testing shall be conducted within ninety (90) days of beginning to use the BW-Boiler for control of either the COS stream or SHEETFUMES. Testing shall be repeated at least once every five (5) years from the date of the most recent compliance demonstration.

...

(g) ~~Within 180 days after issuance of this Part 70 permit~~**No later than April 25, 2012 for L Boiler and June 12, 2012 for E Boiler**, in order to demonstrate compliance with Condition K.2.4, the Permittee shall perform PM testing for E BOILER and L BOILER utilizing methods as approved by the Commissioner. The Permittee shall document the baghouse bypass damper position during the performance test. This test shall be repeated at least once every ~~two and one-half (2.5)~~ **five (5)** years from the date of this valid compliance demonstration. Testing shall be conducted in accordance with Section C- Performance Testing.

Change #9

Original Condition K.2.15 is no longer needed because it is related to the operation of SHEETFUMES, Line 16. The text of the condition will be removed; however, the condition will remain as a place holder condition. The effected condition follows:

K.2.15 ~~Volatile Organic Compounds (VOC) from Line 16~~**[RESERVED]**

~~When a VOC-containing coating is being applied or VOC-containing solvent is being used in the Line 16 plastic sheet coating facility as described in Section L of this permit, and VOC emissions are vented to any of the four (4) boilers identified as BW-BOILER, E BOILER, L BOILER, and R BOILER for control of VOC emissions:~~

~~(a) Such boiler(s) shall each operate at a minimum combustion zone temperature of 1400°F, calculated as a rolling 3-hour average, or the temperatures established during the most recent stack test; and~~

~~(b) The Permittee shall monitor and record the combustion zone temperature of such boiler(s) at least once each hour. When for any three (3) hour average reading (arithmetic average of three contiguous one-hour periods), the temperature is below 1400°F or the temperatures established during the most recent stack test, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A parameter reading that is outside the established range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from the limitation set forth in Condition K.2.3 and L.2.1(b) of this permit.~~

Change #10

Original Condition K.2.19 has been modified to remove the reference to fuel oil for boiler BW-Boiler. The revised condition follows:

K.2.19 Visible Emissions Notations

(a) Visible emission notations of the R BOILER and BW-BOILER stack exhaust shall be performed once per day during normal daylight operations when the boilers burn ~~either oil or~~ COS. A trained employee shall record whether emissions are normal or abnormal.

...

Change #11

Original Conditions K.2.20 and K.2.21 have been modified to remove the record keeping requirements for the baghouse bypass damper when the damper is welded closed or the damper is maintained in a closed position by use of a car-seal. IDEM agrees daily recordkeeping of a welded or car-sealed damper is unnecessary. In addition, Condition K.2.21 has been revised to reflect the removal of

original Conditions K.2.3 and K.2.9 and SHEETFUMES, Line 16. Revisions to original Conditions K.2.20 and K.2.21 follow:

K.2.20 Baghouse Parametric Monitoring [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

...

(c) The Permittee shall record the position of the baghouse bypass damper used in conjunction with E BOILER, L BOILER, and V BOILER baghouse at least once per day when any of these boilers is in operation. **A reading is not required if the Permittee welds the damper in the closed position or a car-seal is used, the damper position remains unchanged and is verified at the time the weld or car-seal is applied.**

K.2.21 Record Keeping Requirements

...

(c) In order to document compliance with Conditions K.2.2~~, K.2.3,~~ **and** K.2.8~~, and K.2.9~~, the Permittee shall maintain, at least hourly, records of the combustion zone temperatures of any of the four (4) boilers, BW-BOILER, E BOILER, L BOILER, and R BOILER that are being used to control VOC emissions (SHEETFUMES) from C-41~~,~~ **and** C-42~~, and/or Line 16~~.

...

(g) To document compliance with Condition K.2.19, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition K.2.19(a).~~ **the daily record of the visible emission notations of the stack exhaust required by Condition K.2.19(a). When a daily record of normal or abnormal is not recorded, the Permittee shall maintain records of the reason(s) for the lack of a visible emission notation (e.g. the process did not operate that day or did not burn either oil or COS that day).**

(h) To document compliance with Condition K.2.20, the Permittee shall maintain the records recorded once per day of the position of the baghouse bypass damper and of the pressure drop across the baghouse used in conjunction with E BOILER, L BOILER, and V BOILER during normal operation. **Daily records of the baghouse bypass damper position are not required on days for which the Permittee maintains the damper in the closed position by using a car-seal or by welding, provided that the Permittee has previously documented the damper position at the time the car-seal or weld is applied.**

(i) All records required to be maintained by Condition K.2.21 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Change #12

Original Condition K.2.22(c) has been revised to remove the reference to Condition K.2.6. The opacity limit is set by Condition C.2 and Condition K.2.22(c) is intended to indicate the operating conditions that would require opacity exceedances to be reported. The modified condition follows:

K.2.22 Reporting Requirements

...

(c) ~~In order to determine compliance with Condition K.2.6, a~~ **A** quarterly report of opacity exceedances shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. A

report containing the information specified in 326 IAC 3-5-7 may be used to fulfill this requirement. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

...

Change #13

Sections L.1 and L.2 have been modified to include the requirements of 40 CFR 63, Subpart PPPP. In addition, all references to SHEETFUMES, Line 16 have been removed. Where necessary, the table of contents and condition numbering has been updated to reflect the following changes. The proposed changes to Sections L.1 and L.2 follow below:

L.1.1 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR Part 63, Subpart A] [Table 2 to 40 CFR Part 63, Subpart PPPP] [40 CFR 63.4501]

~~(a) The provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, apply to the affected source identified as Sp-PPPC, except as otherwise specified by Table 2 to 40 CFR Part 63, Subpart PPPP. The Permittee must comply with these requirements, when applicable, on and after April 19, 2004.~~

~~(b) Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition, except as otherwise provided in this condition. The permit shield applies to Condition L.1.5 National Emissions Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products - Notification Requirements.~~

The table that follows sets forth provisions of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as otherwise specified by Table 2 to 40 CFR Part 63, Subpart PPPP.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.6(e)(1)	Compliance with standards and maintenance requirements
63.6(f)(2-3)	Compliance with standards and maintenance requirements
63.8(b)	Monitoring requirements

L.1.2 National Emission Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products **[326 IAC 20-81]** [40 CFR Part 63, Subpart PPPP] [40 CFR 63.4481] [40 CFR 63.4482] [40 CFR 63.4483(b)] [40 CFR 63.4581]

(a) The provisions of 40 CFR Part 63, Subpart PPPP (National Emission Standards for Hazardous Air Pollutants for Surface Coating of Plastic Parts and Products) apply to the affected source, identified as Sp-PPPC. Pursuant to 40 CFR 63.4483(b), the Permittee must comply with these requirements on and after April 19, 2007, or such other compliance date authorized pursuant to 40 CFR 63.6. **The following table provides specific requirements of 40 CFR 63, Subpart PPPP that apply to the affected source Sp-PPPC:**

Applicable 40 CFR Part 63, Subpart PPPP Requirement	Regulatory Citation Description
63.4481(a)	Applicability Standards
63.4481(b)	Applicability Standards
63.4481(c)	Applicability Standards
63.4481(e)(1)	Applicability Standards
63.4482(a)	Applicability Standards
63.4482(b)	Affected Source
63.4482(e)	Affected Source
63.4483(b)	Compliance Date Requirements
63.4483(d)	Compliance Date Requirements
63.4580	Implementation and Enforcement of Subpart
63.4581	Definitions

(b) ~~Since the applicable requirements associated with the compliance options are not included and specifically identified in this permit, the permit shield authorized by the B section of this permit in the condition titled Permit Shield, and set out in 326 IAC 2-7-15 does not apply to paragraph (a) of this condition.~~**[RESERVED]**

(c) In accordance with 40 CFR 63, Subpart PPPP, the following emissions units comprise the affected source, identified as Sp-PPPC, that is subject to 40 CFR 63, Subpart PPPP:

(1) All coating operations as defined in 40 CFR 63.4581;
(2) All storage containers and mixing vessels in which coatings, thinners and/or other additives, and cleaning materials are stored or mixed;
(3) All manual and automated equipment and containers used for conveying coatings, thinners and/or other additives, and cleaning materials; and
(4) All storage containers and all manual and automated equipment and containers used for conveying waste materials generated by a coating operation.

(d) Terminology used in requirements established in this permit pursuant to 40 CFR 63, Subpart PPPP are defined in the CAA, in 40 CFR 63.2, and in 40 CFR 63.4581, and are applicable to the affected source Sp-PPPC.

L.1.5 General Provisions Relating to HAPs [326 IAC 20-1] [40 CFR 63, Subpart A]

The following table provides performance testing requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as provided in Table 2 of 40 CFR 63, Subpart PPPP:

Applicable 40 CFR Part 63, Subpart A Requirements	Regulatory Citation Description
63.7(a)(3)	Administrator may require performance testing

L.1.~~5~~**6** Notification Requirements for Sp-PPPC [40 CFR 63.4510]

To comply with Condition L.1.2, the Permittee shall submit all of the notifications described in 40 CFR 63.4510, Subpart PPPP that apply to the affected source by the dates specified. These notifications include, but are not limited to, the following:

(a) General. The Permittee must submit the notifications in 40 CFR 63.7(b) and (c), 63.8(f)(4), and 63.9(b) through (e) and (h) that apply to the affected source Sp-PPPC by the dates specified in those sections, except as provided in 40 CFR 63.4510(b) and (c). **The initial notification required by 40 CFR 63.4510(b) was submitted by the Permittee on April 5, 2005.**

(b) Notification of compliance status. The Permittee must submit the notification of compliance status required by 40 CFR 63.9(h) no later than 30 calendar days following the end of the initial compliance period described in 40 CFR 63.4540, 40 CFR 63.4550, or 40 CFR 63.4560 that applies to the affected source Sp-PPPC. The notification of compliance status must contain the information specified in 40 CFR 63.4510(c), paragraphs (1) through (11) and in 40 CFR 63.9(h).

L.1.7 Reporting Requirements

The notifications required by Condition~~s~~ L.1.~~5~~**6** shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

~~Unless submitted prior to the effective date of this Part 70 permit, t~~**T**he notifications required by L.1.~~5~~**6** require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

L.1.8 Record Keeping and Reporting Requirements for Sp-PPPC

(a) The table that follows provides the record keeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-PPPC, except as provided in Table 2 to 40 CFR 63, Subpart PPPP.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements
63.9(b)	Notification requirements
63.9(h)	Notification requirements - Notification of compliance status
63.10(a)	Recordkeeping and reporting requirements - Applicability and general information
63.10(b)(1)	Recordkeeping and reporting requirements - General recordkeeping requirements
63.10(b)(3)	Recordkeeping and reporting requirements - General recordkeeping requirements

Applicable 40 CFR Part 63, Subpart A Requirement	**Regulatory Citation Description**
63.10(d)(1)	**Recordkeeping and reporting requirements - General reporting requirements**
63.12(c)	**State authority and delegations**
63.13(a)	**Addresses of State air pollution control agencies and EPA Regional Offices**
63.13(b)	**Addresses of State air pollution control agencies and EPA Regional Offices**

(b) All records required to be maintained by Condition L.1.8 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit reports and records required to be submitted by Condition L.1.8 to the address listed in Section C - General Reporting Requirements, of this permit.

L.1.~~6~~**9** Record Keeping and Reporting Requirements **for Sp-POWC**

(a) The table that follows provides the record keeping and reporting requirements of 40 CFR Part 63, Subpart A - General Provisions, which are incorporated by reference as 326 IAC 20-1-1, that apply to the affected source Sp-POWC, except as provided in Table 2 to 40 CFR 63, Subpart JJJJ.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
63.5	Preconstruction review and notification requirements
63.9(a)	Notification requirements
63.9(b)	Notification requirements
63.9(h)	Notification requirements - Notification of compliance status
63.10(a)	Recordkeeping and reporting requirements - Applicability and general information
63.10(b)	Recordkeeping and reporting requirements - General recordkeeping requirements
63.10(d)	Recordkeeping and reporting requirements - General reporting requirements
63.12(c)	State authority and delegations
63.13(a)	Addresses of State air pollution control agencies and EPA Regional Offices
63.13(b)	Addresses of State air pollution control agencies and EPA Regional Offices

(b) All records required to be maintained by Condition L.1.~~6~~**9** shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(c) The Permittee shall submit reports and records required to be submitted by Condition L.1.~~6~~**9** to the address listed in Section C - General Reporting Requirements, of this permit.

~~L.1.8 Requirement to Submit a Significant Permit Modification Application [326 IAC 2-7-12] [326 IAC 2-7-5]~~

~~The Permittee shall submit an application for a significant permit modification to IDEM, OAQ to include information regarding which compliance option or options will be chosen in the Part 70 permit to comply with 40 CFR 63, Subpart PPPP.~~

~~(a) The significant permit modification application shall be consistent with 326 IAC 2-7-12, including information sufficient for IDEM, OAQ to incorporate into the Part 70 permit the applicable requirements of 40 CFR 63, Subpart PPPP, a description of the affected source and activities subject to the standard, and a description of how the Permittee will meet the applicable requirements of the standard.~~

~~(b) The significant permit modification application for affected source Sp-PPPC shall be submitted no later than the date specified in 40 CFR 63.4510(c) for submitting the Notification of Compliance Status.~~

~~(c) The significant permit modification application shall be submitted to:~~

~~Indiana Department of Environmental Management~~
~~Permits Branch, Office of Air Quality~~
~~100 North Senate Avenue~~
~~MC 61-53 IGCN 1003~~
~~Indianapolis, Indiana 46204-2251~~

SECTION L.2 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Structured Products, Building 4

Structured Products Operations

(c) The Structured Products operations consist of the following emission units. Each emission unit is identified with an affiliated stack/vent I.D; the emission unit description; the type of air pollution control device (APCD), if present; the type of integral device (considered integral to the process), if present; the maximum process input rate, the date of construction, if applicable, and whether the emission unit is significant or insignificant under 326 IAC 2-7. This facility may also include additional insignificant activities listed in Section A.21 of this permit.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Air Pollution Control Devices	Integral Devices[(b)]	Maximum Capacity[(c)]	Date of Construct
09-001; 09-002; and 09-106	SHEETFUMES*	COATING LINES - C-41, C-42, S-4, S-5~~, Line 16~~	Boilers in Section K	None	N/A	N/A
...	...	...	...	...	...	...
10-357	F19BV	F-19 BARREL VENT	None	None	0.40 tons/hour	N/A

[a] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40))
[b] Equipment is integral to the process operation.
[c] When applicable, the maximum capacity is either the maximum process input rate; the maximum tank volume capacity; or the maximum heat input rate.
[d] Emission unit is defined as an insignificant activity (326 IAC 2-7-1(21))

* The SHEETFUMES stream is made up of VOC emissions created by the plastic sheet coating lines identified as C-41, C-42~~, Line 16~~, S-4, and S-5. The boilers described in Section K of this permit, ~~BW-Boiler,~~ E Boiler, and R Boiler are used for controlling VOC emissions from the SHEETFUMES stream. ~~However, BW-Boiler may only be used for control when the Line 16 coating line is the only coating line operating.~~

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

L.2.1 Prevention of Significant Deterioration Minor Limit (PSD) [326 IAC 2-2] ~~[40 CFR 52.21]~~

(a) ~~Pursuant to PC (65) 1555, Condition 1(a), issued on May 29, 1984 as revised through the Title V permit, t~~**T**he input of volatile organic compound (VOC) to the C-41 and C-42 coating lines shall be limited to a total of 1860 tons per twelve (12) consecutive month period. This production limitation and use of one or more of the boilers, E BOILER, R BOILER, and BW-Boiler, for control as described in Condition K.2.2, is equivalent to 93 tons of VOC emissions per twelve (12) consecutive month period and is necessary to keep the net emission increase below PSD significant emission levels. This condition renders the requirements of 326 IAC 2-2~~ and 40 CFR 52.21~~, Prevention of Significant Deterioration not applicable.

(b) ~~Pursuant to SSM 129-10709-00002, Condition D.1.1, issued on July 21, 1999, as revised through the Title V permit, the input of volatile organic compound (VOC) to the Line 16 coating line shall be limited to a total of 214.84 tons per twelve (12) consecutive month period. This production limitation and use of boilers, BW-Boiler, E Boiler, L Boiler, and/or R Boiler, for control as specified in Condition K.2.3, is equivalent to 10.74 tons of VOC emissions per twelve (12) consecutive month period and renders the requirements of 326 IAC 2-2 and 40 CFR 52.21, Prevention of Significant Deterioration not applicable.~~**[RESERVED]**

L.2.3 National Emission Standards for Hazardous Air Pollutants: Surface Coating of Plastic Parts and Products [40 CFR Part 63, Subpart PPPP]

In accordance with 40 CFR 63.4500(a)(1), the Permittee shall comply with the requirements of 40 CFR 63, Subpart PPPP, by using compliant materials that comply with the organic HAP emissions level specified in 40 CFR 63.4490(b)(1) for Sp-PPPC (including lines C-41 and C-42).

L.2.~~3~~**4** Volatile Organic Compounds (VOC) [326 IAC 8-2-5]

Pursuant to 326 IAC 8-2-5, the Permittee shall not allow the discharge into the atmosphere VOC in excess of two and nine-tenths (2.9) pounds per gallon excluding water, as delivered to the coating applicator of the S-4, S-5, C-6~~, Line 16~~, C7A, C7B, and C8 coating lines.

L.2.~~4~~**5** Particulate [326 IAC 6-3-2]

...

L.2.~~5~~**6** Volatile Organic Compounds (VOC)[326 IAC 2-2]~~[40 CFR 52.21]~~

(a) Whenever the C-41 and C-42 coating processes are operating, Conditions K.2.8 and K.2.14 of this permit apply.

(b) ~~Whenever the Line 16 coating process is operating, Conditions in K.2.9 and K.2.15 of this permit apply.~~**[RESERVED]**

L.2.~~6~~**7** Volatile Organic Compounds (VOC)

Compliance with the VOC content and usage limitations contained in Condition L.2.1 and L.2.~~3~~**4** shall be determined pursuant to 326 IAC 8-1-4(a)(3)(A) or by using formulation data supplied by the coating manufacturer. However, IDEM, OAQ, reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.

L.2.~~7~~**8** Methods and Procedures [326 IAC 20-11] [40 CFR 63, Subpart JJJJ]

Pursuant to 40 CFR 63, Subpart JJJJ, and in order to comply with Condition L.2.2, the Permittee shall comply with the applicable 40 CFR Part 63, Subpart JJJJ performance testing and compliance determination requirements listed in the following table for coating lines S-4, S-5, C-6, C-45, C7A, C7B, and C8 as applicable. The table also includes Section LL condition numbers where descriptions of the provisions can be found.

...

L.2.9 Methods and Procedures [326 IAC 20-11][40 CFR 63, Subpart PPPP]

Pursuant to 40 CFR 63, Subpart PPPP, and in order to comply with Condition L.2.3, the Permittee shall comply with the applicable 40 CFR 63, Subpart PPPP compliance demonstration requirements listed in the following table for Sp-PPPC (including coating lines C-41 and C-42) as applicable.

Applicable 40 CFR Part 63, Subpart PPPP Requirements	Regulatory Citation Description	Sp-PPPC	
		C-41	C-42
63.4491(a)	What are my options for meeting the emission limits?	X	X
63.4492(a)	What operating limits must I meet?	X	X
63.4493(a)	What work practice standards must I meet?	X	X
63.4500(b)	What are my general requirements for complying with the subpart?	X	X
63.4540	By what date must I conduct the initial compliance demonstration?	X	X
63.4541	How do I demonstrate initial compliance with the emission limits?	X	X
63.4542	How do I demonstrate continuous compliance with the emission limitations?	X	X

L.2.~~8~~**10** Particulate Control [326 IAC 2-7-6(6)]

...

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

L.2.~~9~~**11** Visible Emissions Notations

...

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

L.2.~~10~~**12** Record Keeping Requirements

(a) In order to document compliance with Conditions L.2.1 and L.2.~~3~~**4** the Permittee shall maintain records in accordance with (1) through (3) below. Records maintained for (1) through (3) shall be maintained for each calendar month and shall be sufficient to establish compliance with the VOC usage limits and/or the VOC emission limits established in Conditions L.2.1 and L.2.~~3~~**4**. Records necessary to demonstrate compliance shall be available within 30 days of the end of each compliance period.

...

(c) In order to document compliance with Condition L.2.3, the Permittee shall comply with the applicable 40 CFR 63, Subpart PPPP record keeping and reporting requirements for Sp-PPPC (including coating lines C-41 and C-42) as applicable.

Applicable 40 CFR Part 63, Subpart PPPP Requirements	Regulatory Citation Description	Sp-PPPC	
		C-41	C-42
63.4510(b)	What notifications must I submit? - Initial notification	X	X
63.4510(c)	What notifications must I submit? - Notification of compliance status	X	X
63.4520(a)	What reports must I submit? - Semiannual compliance report	X	X
63.4530(a)	What records must I keep?	X	X
63.4530(b)	What records must I keep?	X	X
63.4530(c)	What records must I keep?	X	X
63.4530(d)	What records must I keep?	X	X
63.4530(e)	What records must I keep?	X	X
63.4530(f)	What records must I keep?	X	X
63.4530(h)	What records must I keep?	X	X
63.4531	In what form and for how long must I keep my records?	X	X

(~~c~~**d**) To document compliance with Condition L.2.~~9~~**11(a)**, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition L.2.9(a).~~**the weekly record of the visible emission notations required by Condition L.2.11(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

(~~d~~**e**) All records required to be maintained by Condition L.2.~~10~~**12** shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

L.2.1~~1~~**3** Reporting Requirements

A quarterly summary of the information to document compliance with Condition L.2.1(a)~~ and (b)~~, shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Change #14

Section L.3 has been added to the permit. This section includes the requirements of 40 CFR 60, Subpart Dc and 326 IAC 6-2-4 for the temporary boiler, identified as TEMPBOILER. Also, a fuel usage limitation has been added at the request of the Permittee. The limit is intended to reflect the anticipated operation of the temporary boiler and it will make this modification a minor source modification under 326 IAC 2-7-10.5. Finally, a record keeping and reporting requirement has been added to the permit to ensure compliance with the fuel usage limit. Proposed Section L.3 follows:

SECTION L.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Structured Products, Building 4

<u>Temporary Boiler</u>

(d) The boiler listed below represents a temporary, portable steam generating unit for Structured Products. The stack/vent I.D.; emission unit description; maximum heat capacity; and date of construction are in the table.

Significant Activities[(a)]

Stack / Vent I.D	Emission Unit	Emission Unit Description	Maximum Capacity	Date of Construct

10-500	**TEMPBOILER**	**Small natural gas or No.2 fuel oil fired boiler**	**10.468 MMBtu/hr**	**N/A**
[(a)] Emission unit is not defined as an insignificant activity (326 IAC 2-7-1(21)) or trivial activity (326 IAC 2-7-1(40)) **(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)**				

Emission Limitations and Standards [326 IAC 2-7-5(1)]

L.3.1 General Provisions Relating to NSPS [326 IAC 12] [40 CFR 60, Subpart A]

The temporary boiler, identified as TEMPBOILER, is an affected facility under 40 CFR 60, Subpart Dc. The table that follows sets forth provisions of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to TEMPBOILER.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
60.11(a)	Compliance with standards and maintenance requirements
60.11(d)	Compliance with standards and maintenance requirements
60.11(f)	Compliance with standards and maintenance requirements
60.11(g)	Compliance with standards and maintenance requirements

L.3.2 New Source Performance Standards (NSPS) [326 IAC 12] [40 CFR 60, Subpart Dc]

Pursuant to 40 CFR 60.42c(d) and 326 IAC 12, the Permittee shall not combust oil in the affected facility, TEMPBOILER, that contains greater than 0.5 percent by weight sulfur. The table that follows provides the specific applicable standards and monitoring provisions that apply to the TEMPBOILER.

Applicable 40 CFR Part 60, Subpart Dc Requirement	Regulatory Citation Description
60.42c(d)	Standard for Sulfur Dioxide
60.42c(i)	Standard for Sulfur Dioxide

L.3.3 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4(a) (Particulate Emission Limitations for Sources of Indirect Heating: emission limitations for facilities specified in 326 IAC 6-2-1(d)), particulate emissions from the boiler identified as TEMPBOILER shall not exceed 0.146 pounds of particulate matter per million British thermal unit (lb/MMBtu) heat input. This limitation was calculated using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

Where
Q = total source heat input capacity (MMBtu/hr)
For this unit, Q = 2,308.97 MMBtu/hr.

L.3.4 Significant Source Modification Avoidance Limit [326 IAC 2-7-10.5(f)]

In order to keep MSM 129-26621-00002 a minor source modification, the Permittee shall limit the hours of operation of the temporary boiler, identified as TEMPBOILER, to less than 1,500 hours per twelve (12) consecutive month period with compliance determined at the end of each month. Compliance with this limit on the hours of operation for the temporary boiler, identified as TEMPBOILER, along with emergency generators, identified as 17-500 and 17-501, will limit the potential to emit NOx below twenty-five (25) tons per year and will render the requirements of 326 IAC 2-7-10.5(f) not applicable to this modification.

Compliance Determination Requirements

L.3.5 Methods and Procedures [326 IAC 12] [40 CFR 60, Subpart Dc]

Pursuant to 40 CFR 60, Subpart Dc, compliance determination requirements for TEMPBOILER are identified in the following table:

Applicable 40 CFR Part 60, Subpart Dc Requirement	Regulatory Citation Description
60.42c(h)	Standard for Sulfur Dioxide
60.44c(h)	Compliance and Performance Test Methods and Procedures for Sulfur Dioxide
60.46c(e)	Emission Monitoring for Sulfur Dioxide

Pursuant to 40 CFR 60.42c(h), compliance with the fuel oil sulfur content limit of 0.05% by weight will be demonstrated via fuel supplier certification.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

L.3.6 Record Keeping and Reporting Requirements

(a) The table that follows provides record keeping and reporting requirements of 40 CFR 60, Subpart A - General Provisions, incorporated by reference in 326 IAC 12-1, that apply to TEMPBOILER.

Applicable 40 CFR Part 63, Subpart A Requirement	Regulatory Citation Description
60.7(a)	Notification and record keeping
60.7(b)	Notification and record keeping
60.7(f)	Notification and record keeping
60.(g)	Notification and record keeping

TEMPBOILER is a mass-produced facility deemed to be purchased in completed form; therefore, the notification requirement in 60.7(a)(1) does not apply.

(b) During periods when the TEMPBOILER is installed, the reporting and record keeping requirements of 40 CFR 60, Subpart Dc, §60.48c(a), (d), (e), (f), (g), (i) and (j) shall apply. Records of fuel oil combustion in the TEMPBOILER shall be maintained and reported as follows:

(1) Record and maintain records of the amount of each fuel combusted during each calendar month and the information required to be reported under (2) below:

(2) Submit reports for each 6-month period as required by 40 CFR 60.48c(j).

Each report shall include:

(A) Calendar dates covered in the reporting period.

(B) Fuel supplier certification, including the following information: name of the oil supplier, a statement from the fuel oil supplier that the fuel oil complies with the specifications under the definition of distillate oil in §60.41c, and sulfur content of the fuel oil.

(C) A certified statement signed by the owner or operator of the affected facility that the records of the fuel oil certifications submitted represent all of the fuel oil combusted during the reporting period.

(c) In order to document compliance with Condition L.3.4, monthly records of the hours of usage of the temporary boiler, identified as TEMPBOILER, shall be maintained.

(d) All records required by Condition L.3.6 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

(e) A quarterly summary of the information to document compliance with Condition L.3.4 shall be submitted to the address listed in Section C - General Reporting Requirements, using the reporting forms located at the end of Section L, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Section L consists of the following Sections: L.1, L.2, **L.3, and** one (1) Part 70 Usage Reporting Form, and one (1) Part 70 Quarterly Reporting Form.

Condition L.~~2.11~~ 3.6 concludes the Section L requirements of this permit

Reporting forms immediately follow.

Change #15

The reporting form for SHEETFUMES, Line 16 has been deleted from the permit. This reporting form is no longer needed with the removal of SHEETFUMES, Line 16 from the permit. In addition, a quarterly reporting form has been added to Section L.3 to allow the Permittee to report compliance with Condition L.3.4. The headers of the reporting forms affected by this change are shown below:

~~**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT**~~
~~**OFFICE OF AIR QUALITY**~~
~~**Compliance Data Section**~~

~~**Part 70 Quarterly Report**~~
~~(Submit Report Quarterly)~~

~~Source Name: SABIC Innovative Plastics Mt. Vernon, LLC~~
~~Source Address: 1 Lexan Lane, Mt. Vernon, Indiana~~
~~Mailing Address: 1 Lexan Lane, Mt. Vernon, Indiana~~
~~Part 70 Permit No.: T129-6794-00002; Condition L.2.1(b)~~
~~Facility: SHEETFUMES from Line 16 coating line~~
~~Parameter: VOC~~
~~Limit: The input of volatile organic compound (VOC) to the Line 16 coating line shall be limited to a total of 214.84 tons per twelve (12) consecutive month period.~~

~~YEAR: _____ QUARTER: _____~~

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
Compliance Data Section

Part 70 Quarterly Report
(Submit Report Quarterly)

Source Name: **SABIC Innovative Plastics Mt. Vernon, LLC**
Source Address: **1 Lexan Lane, Mt. Vernon, Indiana 47620-9367**
Mailing Address: **1 Lexan Lane, Mt. Vernon, Indiana 47620-9367**
Part 70 Permit No.: **T129-6794-00002; Condition L.3.4**
Facility: **Temporary Boiler, identified as TEMPBOILER**
Parameter: **Hours of Usage**
Limit: **Less than 1,500 hours per twelve (12) consecutive month period.**

YEAR: _____ QUARTER: _____

Change #16

Section S.3 has been added to the permit to insert permit conditions related the temporary emergency generators. The revised facility description box follows:

SECTION S.3 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: Emergency Generators and Pumps, Entire Plant Site

<u>Temporary Emergency Generators</u>

(c) The generators listed below represent temporary, portable, emergency generators. Each emergency generator is individually identified with an affiliated stack/vent I.D.; plant location, rated horsepower (hp); and heat input. Generator units may vary depending upon which units are available when needed.

Stack / Vent I.D	Emission Unit	Plant Location	Maximum Capacity	Heat Input Capacity (MMBtu/hr)
17-500	Generator 17-500	AS NEEDED	2,332 HP	15.22
17-501	Generator 17-501	AS NEEDED	2,332 HP	15.22
(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)				

Change #17

A permit condition specifically limiting operation of the emergency generators to 500 hours of annual operation has been added to the permit at the request of the Permittee. In addition, a permit condition was added to require the use of No. 2 diesel fuel. Proposed Condition S.3.1 follows:

Emission Limitations and Standards [326 IAC 2-7-5(1)]

S.3.1 Emergency Generator Service

The emergency generators to which this section applies shall be limited as provided below:

(a) Each generator shall be limited to less than 500 hours of operation per twelve (12) consecutive month period with compliance determined at the end of each month.

(b) Each generator shall operate on No. 2 diesel fuel.

Change #18

The text box at the end of original section S.2 has been relocated to the end of proposed section S.3. In addition, the text has been update to show the addition of Section S.3 to the permit. The revised text box is shown below:

Section S consists of the following Sections: S.1, S.2, **S.3** and two (2) Part 70 Quarterly Reporting Forms.

Condition S.~~2.4~~3.1 concludes the Section S requirements of this permit

Reporting forms immediately follow.

Change #19

On March 3, 2003, U.S.EPA published a notice for "Conditional Approval of Implementation Plan: Indiana" in the Federal Register / Vol. 68, No.41 at pages 9892 through 9895. This notice grants conditional approval to the PSD State Implementation Plan (SIP) under provisions of 40 CFR §51.166 and 40 CFR §52.770 while superseding the delegated PSD SIP authority under 40 CFR §52.793. The effective date for these provisions is April 2, 2003. Therefore, the PSD permits will be issued under the authority of 326 IAC 2-2 and will no longer be issued under the provision of 40 CFR 52.21 and 40 CFR 124. All references to 40 CFR 52.21 have been removed from the following permit conditions: D.2.1, E.2.1, E.3.1, E.4.1, F.4.1, K.2.1, K.2.2, K.2.8, L.2.1, L.2.6, N.2.1, N.3.1, Q.2.1, S.1.1 and S.2.1.

Change #20

Attachment A to the permit has been updated to include the requirements of 40 CFR 63, Subpart PPPP as Section OO and 40 CFR 60, Subpart Dc as Section PP. The specific applicable requirements are shown in the individual facility sections and the entire text of the NSPS/NESHAP are included as an attachment.

Change #21

With regards to record keeping requirements for visible emission notations (and other parametric monitoring), the intent is that the Permittee needs to make a record of some sort every day. So if they do the VE observation, then they write down normal or abnormal. Additionally, if they don't do the VE observation, they still need to make some sort of record that day as to why they didn't, such as the unit was not operating, or the unit was venting indoors that day, etc. In order to attempt to clarify the requirements, the recordkeeping requirements relating the VEs and other daily parametric monitoring have been revised. The following conditions have been updated as a result of this modification:

D.3.11 Record Keeping Requirements

...

(d) To document compliance with Condition D.3.10, the Permittee shall maintain ~~records once per day of the pressure drop across each baghouse used in conjunction with BW1-BOILER and BW2-BOILER during normal operation.~~ **the daily record of the pressure drop readings across each baghouse required by Condition D.3.10. When a daily reading is not recorded, the Permittee shall maintain records of the reason for the lack of a pressure drop reading (e.g. the process did not operate during that day).**

D.4.4 Record Keeping Requirements

(a) To document compliance with Condition D.4.3, the Permittee shall maintain ~~the records of the visible emission notations of the stack exhaust required by Condition D.4.3(a).~~ **the weekly record of the visible emission notations required by Condition D.4.3(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

(b) All records required to be maintained by Condition D.4.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

E.4.8 Record Keeping and Reporting Requirements

...

(c) To document compliance with Condition E.4.7, the Permittee shall maintain ~~the records of visible emission notations of the H-530A and H-530B stack exhausts required by Condition E.4.7(a).~~ **the daily record of the visible emission notations required by Condition E.4.7(a). When a daily record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours, the unit did not operate during the week or the process did not burn hazardous waste that day).**

F.3.4 Record Keeping Requirements

(a) To document compliance with Condition F.3.3, the Permittee shall maintain ~~the records of visible emission notations of the stack exhausts required by Condition F.3.3.~~ **the weekly record of the visible emission notations required by Condition F.3.3. When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

(b) All records required to be maintained by Condition F.3.4, shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

G.2.7 Record Keeping Requirements

...

(d) To document compliance with Condition G.2.6, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition G.2.6(a).~~ **the weekly record of the visible emission notations required by Condition G.2.6(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

J.1.5 Record Keeping Requirements

(a) To document compliance with Condition J.1.4, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition J.1.4(a).~~ **the weekly record of the visible emission notations required by Condition J.1.4(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

(b) All records required to be maintained by Condition J.1.5 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

O.1.4 Record Keeping Requirements

(a) To document compliance with Condition O.1.3, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition O.1.3(a).~~ **the weekly record of the visible emission notations required by Condition O.1.3(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

(b) All records required to be maintained by Condition O.1.4 shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Q.2.21 Record Keeping and Reporting Requirements

...

(g) To document compliance with Condition Q.2.20, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition Q.2.20(a).~~ **the weekly record of the visible emission notations required by Condition Q.2.20(a). When a weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).**

...

R.1.4 Record Keeping Requirements

(a) To document compliance with Condition R.1.3, the Permittee shall maintain ~~the records of visible emission notations of the stack exhaust required by Condition R.1.3(a).~~ **the weekly record of the visible emission notations required by Condition R.1.3(a). When a**

weekly record of normal or abnormal is not recorded, the Permittee shall include in its records the reason for the lack of a visible emission notation (e.g. the process did not operate during normal daylight hours or the unit did not operate during the week).

(b) All records required to be maintained by Condition R.1.4, shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Change #22

Condition B.26 has been modified to show the inclusion of Section OO and PP to the permit. The revised condition follows:

B.26 Applicable Requirements

Many provisions in Sections D - U of the permit contain references to a "permit condition" in Sections AA - ~~NN~~**PP**, as well as a citation to a federal regulation in Title 40 of the Code of Federal Regulations. In each case, the applicable requirement is the federal regulation that is cited (version in effect as of the effective date of this permit, or as specifically updated in an amendment or renewal of this permit). The "permit conditions" in Sections AA - ~~NN~~**PP** are not applicable requirements and are not enforceable; they are solely for informational purposes. The Permittee is not required to certify compliance with any provision in Sections AA - ~~NN~~**PP**.

Conclusion and Recommendation

The construction of this proposed modification shall be subject to the conditions of the attached proposed Part 70 Minor Source Modification No. 129-26621-00002 and Significant Permit Modification 129-26650-00002. The staff recommends to the Commissioner that this Part 70 Minor Source and Significant Permit Modification be approved.

Appendix A: Emissions Summary Sheet
Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address City IN Zip: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: July 29, 2008

Potential to Emit of the Modification (tons/yr)							
Emission Unit	**PM**	**PM10**	**SO_2**	**VOC**	**CO**	**NOx**	**Total HAPs**
Temporary Boiler	2.29	2.29	2.33	0.25	6.88	11.46	Negligible
Generator 17-500	0.09	0.09	0.21	0.17	0.39	9.38	Negligible
Generator 17-501	0.09	0.09	0.21	0.17	0.39	9.38	Negligible
Total for Modification	2.47	2.47	2.75	0.59	7.66	30.22	Negligible

Limited Potential to Emit of the Modification (tons/yr)							
Emission Unit	**PM**	**PM10**	**SO_2**	**VOC**	**CO**	**NOx**	**HAPs**
Temporary Boiler (1)	0.39	0.39	0.40	0.04	1.18	1.96	Negligible
Generator 17-500	0.09	0.09	0.21	0.17	0.39	9.38	Negligible
Generator 17-501	0.09	0.09	0.21	0.17	0.39	9.38	Negligible
Total for Modification	0.57	0.57	0.82	0.38	1.96	20.72	Negligible

Notes:

1) In order for this application to qualify as a minor source modification, the source accepted a limit of 1,500 hours of operation of the temporary boiler. At 10.468 MMBtu/hr, this equates to a total heat input capacity of 15,700 MMBtu/yr.
2) The generators proposed in this modification qualify as emergency units. This designation allows the potential to emit to be calculated on five hundred (500) hours of operation.
3) The temporary boiler is capable of operation on oil or natural gas. The potential to emit summary above shows the worst case emissions based on both fuels.
4) Emissions from the boiler are worst case for PM/PM10, SO2 and NOx during fuel oil combustion.
5) Emissions from the boiler are worst case for VOC, CO and HAPs during natural gas combustion.
6) PM is assumed to be the same as PM10.
7) The emergency generators will be identical units; therefore, only one emission calculation sheet is shown in this appendix. Identical emissions are shown for each generator in the summary above.

Appendix A: Emissions Calculations
Natural Gas Combustion - Temporary Boiler
Criteria Pollutants

Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address City IN Zip: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: July 29, 2008

Heat Input Capacity MMBtu/hr	Unlimited Throughput (MMCF/yr)	Limited Throughput (MMCF/yr)	Limited Quantity (hours/yr)	Limited Quantity (MMBtu/yr)
10.468	89.90	15.39	1,500	15,700

	Pollutant					
	PM	PM10	SO2	NOx	VOC	CO
Emission Factor in lb/MMCF	8.16	8.16	0.60	204.00	5.50	153.00
Unlimited PTE in tons/yr	0.37	0.37	0.03	9.17	0.25	6.88
Limited PTE in tons/yr	0.06	0.06	0.00	1.57	0.04	1.18

Methodology
1) MMBtu = 1,000,000 Btu
2) MMCF = 1,000,000 Cubic Feet of Gas
3) Unlimited Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,020 MMBtu
4) Limited Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x Operating Hours (hrs/yr) x 1 MMCF / 1,020 MMBtu
5) Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF) / 2,000 lb/ton
6) PM/PM10, NOx and CO emission factors were provided by the applicant from a vendor guarantee.
7) SO2 and VOC emission factors are from AP-42, Chapter 1.4-2, 7/98.
8) Limited Quantity (MMBtu/yr) = Heat Input Capacity (MMBtu/hr) x Limited Hours of Operation (hr/yr)

See page 2 for HAPs emissions calculations.

Appendix A: Emissions Calculations
Natural Gas Combustion Only
HAPs Emissions

Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address City IN Zip: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: July 29, 2008

	HAPs - Organics				
	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene
Emission Factor in lb/MMcf	2.1E-03	1.2E-03	7.5E-02	1.8E+00	3.4E-03
Unlimited PTE in tons/yr	9.440E-05	5.394E-05	3.371E-03	8.091E-02	1.528E-04
Limited PTE in tons/yr	1.616E-05	9.234E-06	5.771E-04	1.385E-02	2.616E-05

	HAPs - Metals				
	Lead	Cadmium	Chromium	Manganese	Nickel
Emission Factor in lb/MMcf	5.0E-04	1.1E-03	1.4E-03	3.8E-04	2.1E-03
Unlimited PTE in tons/yr	2.248E-05	4.945E-05	6.293E-05	1.708E-05	9.440E-05
Limited PTE in tons/yr	3.848E-06	8.465E-06	1.077E-05	2.924E-06	1.616E-05

1) Methodology is the same as page 1.
2) The five highest organic and metal HAPs emission factors are provided above.
3) Additional HAPs emission factors are available in AP-42, Chapter 1.4.

Appendix A: Emissions Calculations
Fuel Oil Combustion - Temporary Boiler
Criteria Pollutants

Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address, City IN Zip: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: June 18, 2008

Heat Input Capacity MMBtu/hr	Throughput kgal/yr Unlimited	Limited	Operating Hours
10.468	655.00	112.2	1,500

S = Weight % Sulfur: 0.05

	Pollutant				
	PM	SO2	NOx	VOC	CO
Emission Factor in lb/kgal	7.0	7.1 *(142.0S)*	35.0	0.34	21.0
Unlimited PTE in tons/yr	2.29	2.33	11.46	0.11	6.88
Limited PTE in tons/yr	0.39	0.40	1.96	0.02	1.18

Methodology

1) 1 gallon of No. 2 Fuel Oil has a heating value of 140,000 Btu
2) Unlimited Throughput (kgals/year) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1kgal per 1000 gallon x (1,000,000 Btu / MMBtu) x (1 gal / 140,000 Btu)
3) Limited Throughput (kgals/yr) = Heat Input Capacity (MMBtu/hr) x Operating Hours (hrs/yr) x 1kgal per 1000 gallon x (1,000,000 Btu / MMBtu) x (1 gal / 140,000 Btu)
4) SO2 and VOC emission factors are from AP-42, Tables 1.3-1 and 1.3-3 (SCC 1-03-005-01/02/03) Supplement E 9/98
5) Emission (tons/yr) = Throughput (kgals/ yr) x Emission Factor (lb/kgal)/2,000 lb/ton
6) Emission factors for PM, NOx and CO were provided by the applicant. They are from a vendor guarantee.

See page 2 for HAPs emission calculations.

Appendix A: Emissions Calculations
Fuel Oil Combustion - Temporary Boiler
HAPs Emissions

Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address, City IN Zip: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: July 29, 2008

	HAPs - Metals				
	Arsenic	Beryllium	Cadmium	Chromium	Lead
Emission Factor in lb/mmBtu	4.0E-06	3.0E-06	3.0E-06	3.0E-06	9.0E-06
Unlimited PTE in tons/yr	1.83E-04	1.38E-04	1.38E-04	1.38E-04	4.13E-04
Limited PTE in tons/yr	3.14E-05	2.36E-05	2.36E-05	2.36E-05	7.07E-05

	HAPs - Metals (continued)			
	Mercury	Manganese	Nickel	Selenium
Emission Factor in lb/mmBtu	3.0E-06	6.0E-06	3.0E-06	1.5E-05
Unlimited PTE in tons/yr	1.38E-04	2.75E-04	1.38E-04	6.88E-04
Limited PTE in tons/yr	2.36E-05	4.71E-05	2.36E-05	1.18E-04

Methodology

Organic HAP emissions are negligible

Metal HAPs are from AP-42, Table 1.3-10 (SCC 1-01/02/03-005-01), 9/98

Unlimited PTE (tons/year) = Throughput (mmBtu/hr)*Emission Factor (lb/mmBtu)*8,760 hrs/yr / 2,000 lb/ton

Limited PTE (tons/year) = Throughput (mmBtu/hr)*Emission Factor (lb/mmBtu)*Operating Hours (hr/yr) / 2,000 lb/ton

Appendix A: Emission Calculations
Combustion Emissions
Emergency Generators [17-500 and 17-501]

Company Name: Sabic Innovative Plastics Mt. Vernon, LLC
Address: 1 Lexan Lane, Mt. Vernon, Indiana 47620-9367
Permit Number: MSM 129-26621-00002 and SPM 129-26650-00002
Plt ID: 129-00002
Reviewer: David J. Matousek
Date: July 29, 2008

1. Emission Factors:

Pollutant	Emission Factor		Emission Factor Source
NOx	7.30	g/BHp-hr	Supplied by Permittee, Cummins Generator Specification Sheet, QSK60-G7, 11/02
CO	0.30	g/BHp-hr	Supplied by Permittee, Cummins Generator Specification Sheet, QSK60-G7, 11/02
SOx	0.16	g/BHp-hr	Supplied by Permittee, Cummins Generator Specification Sheet, QSK60-G7, 11/02
PM	0.07	g/BHp-hr	Supplied by Permittee, Cummins Generator Specification Sheet, QSK60-G7, 11/02
VOC[1]	0.13	g/BHp-hr	Supplied by Permittee, Cummins Generator Specification Sheet, QSK60-G7, 11/02
Benzene	7.80E-04	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Formaldehyde	7.90E-05	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Toluene	2.80E-04	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Xylene	1.90E-04	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Acrolein	7.90E-06	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Acetaldehyde	2.52E-05	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96
Naphthalene	1.30E-04	lb/MMBtu	AP-42, Chapter 3.4, Table 3.4-3, 10/96

1) VOC was assumed to be 100% of organic carbon in the exhaust.

2. Generator Rating:

Continuous Power (kW):	1,740	kW	
Continuous Power (BHp):	2,332	BHp	
Hours of Operation:	500	hrs/yr	
Fuel Heat Capacity:	140,000	Btu/gallon	
Heat Input Rate:	15.22	MMBtu/hr	(Estimated by applicant from manufacturer data.)

3.) Emission Rates:

Criteria Pollutants	Emission Factor		Throughput		Emissions (lb/hr)	Emissions (TPY)
NOx	7.3	g/BHp-hr	2,332	BHp	37.53	9.38
CO	0.3	g/BHp-hr	2,332	BHp	1.54	0.39
SOx	0.16	g/BHp-hr	2,332	BHp	0.82	0.21
PM	0.07	g/BHp-hr	2,332	BHp	0.36	0.09
VOC	0.13	g/BHp-hr	2,332	BHp	0.67	0.17
HAPs	**Emission Factor**		**Throughput**		**Emissions (lb/hr)**	**Emissions (TPY)**
Benzene	7.80E-04	lb/MMBtu	15.22	MMBtu/hr	0.01	0.00
Formaldehyde	7.90E-05	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
Toluene	2.80E-04	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
Xylene	1.90E-04	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
Acrolein	7.90E-06	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
Acetaldehyde	2.52E-05	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
Naphthalene	1.30E-04	lb/MMBtu	15.22	MMBtu/hr	0.00	0.00
				Total HAPS	0.01	0.00

5. Methodology:

1) Emissions (lb/hr) = emission factor (g/BHp-hr) x BHP / (453.6 g/lb) or emission factor (lb/MMBtu) x MMBtu/hr
2) Emissions (ton/yr) = emissions (lb/hr) x hours of operation (hr/yr) / (2,000 lb / ton)
3) The source submitted the temporary generators as emergency units. This allows the potential to emit to be calculated on 500 hours of annual operation.