

PSD PERMIT and PART 70 OPERATING PERMIT OFFICE OF AIR MANAGEMENT

**Accra Pac Group, Inc.
2730 Middlebury Street
Elkhart, Indiana 46515**

This permit is issued to the above mentioned company (herein known as the Permittee) under the provisions of 326 IAC 2-2 and 40 CFR 52.21 (Regulations for Prevention of Significant Deterioration of air quality); and 40 CFR 124 (Procedure for Decision Making), with conditions listed on the attached pages.

This permit is also issued in accordance with 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.

PSD and Part 70 Operation Permit No.: 039-6875-00434	
Issued by: Janet G. McCabe, Assistant Commissioner Office of Air Management	Issuance Date:

TABLE OF CONTENTS

A	SOURCE SUMMARY	5
A.1	General Information [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]	
A.2	Emission Units and Pollution Control Equipment Summary [326 IAC 2-7-4(c)(3)]	
A.3	Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)] [326 IAC 2-7-4(c)]	
A.4	Part 70 Permit Applicability [326 IAC 2-7-2]	
B	GENERAL CONDITIONS	10
B.1	Definitions [326 IAC 2-7-1]	
B.2	Permit Term [326 IAC 2-7-5(2)]	
B.3	Enforceability [326 IAC 2-7-7(a)]	
B.4	Termination of Right to Operate [326 IAC 2-7-10] [326 IAC 2-7-4(a)]	
B.5	Severability [326 IAC 2-7-5(5)]	
B.6	Property Rights or Exclusive Privilege [326 IAC 2-7-5(6)(D)]	
B.7	Duty to Supplement and Provide Information [326 IAC 2-7-4(b)] [326 IAC 2-7-5(6)(E)]	
B.8	Compliance with Permit Conditions [326 IAC 2-7-5(6)(A)] [326 IAC 2-7-5(6)(B)]	
B.9	Certification [326 IAC 2-7-4(f)] [326 IAC 2-7-6(1)]	
B.10	Annual Compliance Certification [326 IAC 2-7-6(5)]	
B.11	Preventive Maintenance Plan [326 IAC 2-7-5(1),(3)and (13)][326 IAC 2-7-6(1)and(6)]	
B.12	Emergency Provisions [326 IAC 2-7-16]	
B.13	Permit Shield [326 IAC 2-7-15]	
B.14	Multiple Exceedances [326 IAC 2-7-5(1)(E)]	
B.15	Deviations from Permit Requirements and Conditions [326 IAC 2-7-5(3)(C)(ii)]	
B.16	Permit Modification, Reopening, Revocation and Reissuance, or Termination	
B.17	Permit Renewal [326 IAC 2-7-4]	
B.18	Permit Amendment or Modification [326 IAC 2-7-11][326 IAC 2-7-12]	
B.19	Permit Revision Under Economic Incentives and Other Programs	
B.20	Operational Flexibility [326 IAC 2-7-20]	
B.21	Construction Permit Requirement [326 IAC 2]	
B.22	Inspection and Entry [326 IAC 2-7-6(2)]	
B.23	Transfer of Ownership or Operation [326 IAC 2-7-11]	
B.24	Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-7-5(7)]	
C	SOURCE OPERATION CONDITIONS	22
	Emission Limitations and Standards [326 IAC 2-7-5(1)]	
C.1	PSD Major Source Status [326 IAC 2-2] [40 CFR 52.21]	
C.2	Opacity [326 IAC 5-1]	
C.3	Open Burning [326 IAC 4-1] [IC 13-17-9]	
C.4	Incineration [326 IAC 4-2] [326 IAC 9-1-2]	
C.5	Fugitive Dust Emissions [326 IAC 6-4]	
C.6	Operation of Equipment [326 IAC 2-7-6(6)]	
C.7	Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61.140]	
	Testing Requirements [326 IAC 2-7-6(1)]	

C.8 Performance Testing [326 IAC 3-6]

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

C.9 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

C.10 Monitoring Methods [326 IAC 3]

C.11 Emergency Reduction Plans [326 IAC 1-5-2] [326 IAC 1-5-3]

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

C.12 Risk Management Plan [326 IAC 2-7-5(12)] [40 CFR 68.215]

C.13 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5]

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

C.14 Emission Statement [326 IAC 2-7-5(3)(C)(iii)] [326 IAC 2-7-5(7)] [326 IAC 2-7-19(c)]

C.15 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]

C.16 General Record Keeping Requirements [326 IAC 2-7-5(3)]

C.17 General Reporting Requirements [326 IAC 2-7-5(3)(C)]

Stratospheric Ozone Protection

C.18 Compliance with 40 CFR 82 and 326 IAC 22-1

D.1 FACILITY OPERATION CONDITIONS - Liquid and Aerosol Can Filling 29

General Construction Conditions

D.1.1 through D.1.4

Emission Limitations and Standards

D.1.5 BACT Minor Limitation[326 IAC 8-1-6]

D.1.6 PSD BACT Determination [326 IAC 2-2, and CFR 52.21]

Compliance Determination Requirements

D.1.7 Volatile Organic Compounds

D.1.8 Activated Carbon Filters

D.1.9 NSPS, 40 CFR § 60.110b and 60.116(b)(a) and (b), Subpart Kb

Record Keeping and Reporting Requirements

D.1.10 Record Keeping Requirements

D.1.11 Reporting Requirements

D.2	FACILITY OPERATION CONDITIONS - Various Natural Gas-Fired Boilers (Insignificant Activities)	34
	Emission Limitations and Standards	
D.2.1	Particulate Matter Limitation	
	Compliance Determination Requirements	
D.2.2	Testing Requirements [326 IAC 2-7-6(1),(6)][326 IAC 2-1.1-11]	
	Quarterly Report Forms	35 & 36
	Certification	37
	Quarterly Deviation and Compliance Monitoring Report	38 & 39
	Emergency Occurrence Report	40 & 41

SECTION A SOURCE SUMMARY

This approval is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Management (OAM). The information describing the emission units contained in conditions A.1 through A.3 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 approval pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information

The Permittee owns and operates a liquid and aerosol can filling operation, which has a capability to fill an approximately 420,000,000 cans per year, and handle approximately 674,915,000 pounds per year of VOC-containing liquids.

Responsible Official:	Jim Pickering	
Source Address:	2730 Middlebury Street, Elkhart, Indiana 46515 and Contiguous	Property
Mailing Address:	P. O. Box 878, Elkhart, Indiana 46515	
SIC Code:	7389	
County Location:	Elkhart	
County Status:	Attainment for all criteria pollutants	
Source Status:	Part 70 Permit Program	
	Major Source, under PSD Rules	

A.2 Emission Units and Pollution Control Equipment Summary

This application consists of a consolidation of multiple permits into a single source-wide permit and involves a relaxation of the previously established line by line production limitations in the construction permits issued for the source's two (2) plants Accra Pac and Health Care Industries. This relaxation will enable the source to use the full capacity of its production lines. The stationary source consists of the following emission units and pollution control devices:

- (a) VOC-Containing Propellant Handling Operations including bulk and smaller container unloading, storage, transfer and filling into aerosol product containers. The source has seven (7) aerosol product production lines with a total capacity of 420 million aerosol cans per year.
- (b) VOC-Containing Liquid Handling Operations including bulk and smaller container unloading, storage, transfer, mixing, and filling into liquid and aerosol product containers. The source has nine (9) liquid product filling lines in addition to the seven (7) aerosol product filling lines and all sixteen (16) lines involve VOC-containing liquid handling. The source can handle a maximum of 674,915,000 pounds per year of VOC-containing liquids.
- (c) Scrap Can Processing Operations including automatic and manual devices used to recover contents and allow recycling of scrap metal from aerosol cans from the production operations that are unusable. The manual devices utilize add-on canisters of activated carbon for VOC emission control. The capacity of the scrap can processing operations is limited by permit to less than 4,545,000 scrap cans processed per year (equivalent to less than 25 tons per year of VOC emissions).

Permitted Emission Units and Pollution Control Equipment

- (a) Accra Pac Facilities under Construction Permits and Registration Approvals CP039-3350-00127 issued April 7, 1994; CP039-3682-00127 issued August 11, 1994; CP039-3681-00127 issued November 17, 1994; CP039-4129-00127 issued March 27, 1995 and CP039-4515-00127 issued September 22, 1995:
- (1) Line 1, which consists of seven (7) open and closed mixing tanks, one (1) closed bowl liquid product filler, one (1) under the cup (UTC) propellant filler. This line is rated at 8,400 cans per hour (cans/hr).
 - (2) Line 2, which consists of three (3) closed top mixing tanks, one (1) closed bowl liquid product filler, one (1) UTC propellant filler, one (1) pressure propellant filler. This line is rated at 8,400 cans per hour (cans/hr).
 - (3) Line 3, which consists of one (1) closed bowl liquid product filler, and one (1) non-VOC propellant filler at a rate of 6,300 cans/hr.
 - (4) Line 4, which consists of four (4) closed top mixing tanks, one (1) closed bowl and two (2) portable liquid product fillers, two (2) UTC VOC propellant fillers, two (2) VOC propellant pressure fillers, and two (2) non-VOC propellant fillers. This line is rated 15,120 cans per hour (cans/hr).
 - (5) Line 61, which consists of four (4) closed top mixing tanks, two (2) closed liquid product fillers, one (1) UTC propellant filler and one (1) pressure propellant filler. This line is rated at 7,500 cans/hr.
 - (6) Line 62, which consists of one (1) closed bowl liquid product filler. This line is rated at 7,500 cans/hr.
 - (7) Line 63, which consists of four (4) closed top mixing tanks, two (2) closed bowl and two (2) portable liquid product fillers, and one (1) UTC propellant filler. This line is rated at 7,500 cans/hour.
 - (8) Miscellaneous equipment including thirty-six (36) bulk VOC and non-VOC liquid storage tanks, fifteen (15) bulk VOC and non-VOC propellant storage tanks, seven (7) pre-mix tanks, seven (7) run/storage tanks, two (2) surge tanks for compounding areas, three spray-out booths, five (5) single-head recharge gassers, secondary packaging operations, labelers using hot melt adhesives, and can and carton coders.
- (b) Health Care Industries Facilities under Construction Permit CP039-3345-00212 issued April 15, 1994 and Registration Approval CP039-3791 issued July 26, 1994.
- (1) Eight (8) container filling and packaging operations, identified as Lines 51 through 58 and including seven (7) mixing/batch tanks, ten (10) liquid closed bowl fillers, one (1) liquid open bowl filler, and two (2) tube fillers.
 - (a) Line 51 is capable of filling 2,000 can/hr,

- (b) Line 52 is capable of filling 600 cans/hr,
 - (c) Line 53 is capable of filling 4,500 cans/hr,
 - (d) Line 54 is capable of filling 600 cans/hr,
 - (e) Line 55 is capable of filling 3,750 cans/hr,
 - (f) Line 56 is capable of filling 2,100 cans/hr,
 - (g) Line 57 is capable of filling 2,100 cans/hr,
 - (h) Line 58 is capable of filling 2,100 cans/hr.
- (2) One (1) aerosol can filling line 50, which is capable of filling 4,200 cans/hr.
 - (3) Miscellaneous equipment including twenty-eight (28) VOC and non-VOC liquid pre-mix, run and storage tanks; two VOC propellant storage tanks, and can and carton coders.

A.3 Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)] [326 IAC 2-7-4(c)]
[326 IAC 2-7-5(15)]

This stationary source also includes the following insignificant activities which are specifically regulated, as defined in 326 IAC 2-7-1(21):

- (a) A powder filling operation rated at 411 pounds per hour, which is used on anyone of the fourteen (14) lines.
- (b) One (1) solvent distillation unit, Model LS-55IID to recover isopropyl alcohol (IPA)/solvents for reuse. This unit is capable of recovering 55 gallons per 8-hour shift.
- (c) Single-head recharge gassers used to add propellant to lightweight cans.
- (d) Soil and groundwater remediation systems consisting of soil vapor extraction and air sparging equipment installed for temporary operation under a Remediation Work Plan approved by the IDEM Voluntary Remediation Program.
- (e) Storage equipment and activities including pressurized storage tanks and associated piping for liquid petroleum gas (LPG); liquid natural gas (LNG) (propane);
- (f) Twenty-two (22) pressurized tanks,
- (g) Ink jet printers for small product code and box code printing;
- (h) Natural gas-fired combustion sources with heat input equal to or less than ten million (10,000,000) Btu per hour.
- (i) The source's two (2) natural gas-fired boilers, identified as boilers #1 and #2, each with a heat input capacity of 8.37 mmBtu/hr, and one (1) natural gas-fired boiler #3, with a heat input capacity of 6.28 mmBtu/hr. One (1) natural gas-fired water heater, with heat capacity of 1.5 mmBtu/hr, and two (2) natural gas-fired boilers, one boiler is rated at 1.05 mmBtu/hr and the other is rated at 2.65 mmBtu/hr.
- (j) Combustion source flame safety purging os startup;

- (k) Storage tanks with capacity less than or equal to 1,000 gallons and annual throughputs less than 12,000 gallons;
- (l) Vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids;
- (m) Packaging lubricants and greases;
- (n) Filling drums, pails or other packaging containers with lubricating oils, waxes and greases
- (o) Degreasing operations do not exceed 145 gallons per months not subject to 326 IAC 20-6;
- (p) Cleaners and solvents characterized as follows:
 - (1) Having a vapor pressure equal to or less than 2 kPa; 15mm Hg; or 0.3 psi measured at 38 degrees C (100F) or;
 - (2) Having a vapor pressure equal to or less than 0.7 kPa; 5mm Hg; or 0.1 psi measured at 20C (68F); the use of which for all cleaners and solvents combined does not exceed 145 gallons per 12 months;
- (q) The following equipment related to manufacturing activities not resulting in the emissions of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment;
- (r) Closed loop heating and cooling systems;
- (s) Solvent recycling systems with batch capacity less than or equal to 100 gallons;
- (t) Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to 1% by volume;
- (u) Any operation using aqueous solutions containing less than 1% by weight of VOCs excluding HAPs;
- (v) Water based adhesives that are less than or equal to 5% by volume of VOCs excluding HAPs;
- (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 vessels degassing and cleaning to prepare for internal repairs;
- (z) Stockpiled soils from soil remediation activities that are covered and waiting transport for disposal;
- (aa) Paved and unpaved roads and parking lots with public access;
- (bb) Purging of gas lines and vessels that is related to routine maintenance and repair of buildings, structures, or vehicles at the sources where air emissions from those activities would not be associated with any production process;
- (cc) 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;

- (dd) Blowdown for any of the following: sight glass; boiler; compressors; pumps and cooling tower;
- (ee) Diesel generators not exceeding 1600 horsepower;
- (ff) Stationary fire pumps;
- (gg) Purge double block and bleed valves;
- (hh) Filter or coalescer media changeout; and
- (ii) A laboratory as defined in 326 IAC 2-7-1(21)(D).

A.4 Part 70 Permit Applicability [326 IAC 2-7-2]

This stationary source is required to have a Part 70 permit by 326 IAC 2-7-2 (Applicability) because:

- (a) It is a major source, as defined in 326 IAC 2-7-1(22);

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, any applicable definitions found in IC 13-11, 326 IAC 1-2 and 326 IAC 2-7 shall prevail.

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

This permit is issued for a fixed term of five (5) years from the effective date, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3.

B.3 Enforceability [326 IAC 2-7-7(a)]

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

B.4 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.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 Supplement and Provide Information [326 IAC 2-7-4(b)] [326 IAC 2-7-5(6)(E)]

- (a) The Permittee, upon becoming aware that any relevant facts were omitted or incorrect information was submitted in the permit application, shall promptly submit such supplementary facts or corrected information to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Management
100 North Senate Avenue, P. O. Box 6015

Indianapolis, Indiana 46206-6015

- (b) The Permittee shall furnish to IDEM, OAM, within a reasonable time, any information that IDEM, OAM, 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.
- (c) Upon request, the Permittee shall also furnish to IDEM, OAM, copies of records required to be kept by this permit. If the Permittee wishes to assert a claim of confidentiality over any of the furnished records, the Permittee must furnish such records to IDEM, OAM, along with a claim of confidentiality under 326 IAC 17. If requested by IDEM, OAM, or the U.S. EPA, to furnish copies of requested records directly to U. S. EPA, and if the Permittee is making a claim of confidentiality regarding the furnished records, then the Permittee must furnish such confidential records directly to the U.S. EPA along with a claim of confidentiality under 40 CFR 2, Subpart B.

B.8 Compliance with Permit Conditions [326 IAC 2-7-5(6)(A)] [326 IAC 2-7-5(6)(B)]

- (a) The Permittee must comply with all conditions of this permit. Noncompliance with any provisions of this permit, except those specifically designated as not federally enforceable, constitutes a violation of the Clean Air Act and is grounds for:
 - (1) Enforcement action;
 - (2) Permit termination, revocation and reissuance, or modification; or
 - (3) Denial of a permit renewal application.
- (b) 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.

B.9 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 under this permit 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, on the attached Certification Form, with each submittal.
- (c) A responsible official is defined at 326 IAC 2-7-1(34).

B.10 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 certification shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted in letter form no later than April 15 of each year to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

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, OAM, on or before the date it is due.
- (c) The annual compliance certification report shall include the following:
 - (1) The identification of each term or condition of this permit that is the basis of the certification;
 - (2) The compliance status;
 - (3) Whether compliance was based on continuous or intermittent data;
 - (4) The methods used for determining compliance 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 of this permit, as IDEM, OAM, 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.11 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) If required by specific condition(s) in Section D of this permit, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMP) within ninety (90) days after issuance of this permit, including the following information on each facility:
 - (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;
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If due to circumstances beyond its control, the PMP cannot be prepared and maintained within the above time frame, the Permittee may extend the date an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

- (b) The Permittee shall implement the Preventive Maintenance Plans as necessary to ensure that failure to implement the Preventive Maintenance Plan does not cause or contribute to a violation of any limitation on emissions or potential to emit.
- (c) PMP's shall be submitted to IDEM, OAM, upon request and shall be subject to review and approval by IDEM, OAM. IDEM, OAM, may require the Permittee to revise its Preventive Maintenance Plan whenever lack of proper maintenance causes or contributes to any violation.

B.12 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 provided in 326 IAC 2-7-16.
- (b) An emergency, as defined in 326 IAC 2-7-1(12), constitutes an affirmative defense to an action brought for noncompliance with a health-based or 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, OAM, 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 Management,
Compliance Section), or
Telephone Number: 317-233-5674 (ask for Compliance Section)
Facsimile Number: 317-233-5967

- (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 Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

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) for sources subject to this rule after the effective date of this rule. This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.
 - (e) IDEM, OAM, may require that the Preventive Maintenance Plans required under 326 IAC 2-7-4-(c)(10) be revised in response to an emergency.
 - (f) Failure to notify IDEM, OAM, 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) Operations may continue during an emergency only if the following conditions are met:
 - (1) 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.

(2) If an emergency situation causes a deviation from a health-based limit, the Permittee may not continue to operate the affected emissions facilities unless:

(A) The Permittee immediately takes all reasonable steps to correct the emergency situation and to minimize emissions; and

(B) Continued operation of the facilities is 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.

Any operation shall continue no longer than the minimum time required to prevent the situations identified in (g)(2)(B) of this condition.

B.13 Permit Shield [326 IAC 2-7-15]

(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 date of permit issuance, 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 date of issuance of this permit unless this permit has been modified to reflect such new requirements.

(b) This permit shall be used as the primary document for determining compliance with applicable requirements established by previously issued permits. All previously issued operating permits are superseded by this permit.

(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, OAM, 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 this permit's issuance;
 - (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, OAM, 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, OAM, has issued the modification. [326 IAC 2-7-12(b)(7)]

B.14 Multiple Exceedances [326 IAC 2-7-5(1)(E)]

Any exceedance of a permit limitation or condition contained in this permit, which occurs contemporaneously with an exceedance of an associated surrogate or operating parameter established to detect or assure compliance with that limit or condition, both arising out of the same act or occurrence, shall constitute a single potential violation of this permit.

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 probable cause of such deviations, and any response steps or preventive measures taken shall be reported to:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

using the attached Quarterly Deviation and Compliance Monitoring Report, or its equivalent. 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.

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

- (b) A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit or a rule. It does not include:

- (1) An excursion from compliance monitoring parameters as identified in Section D of this permit unless tied to an applicable rule or limit; or
- (2) Failure to implement elements of the Preventive Maintenance Plan unless such failure has caused or contributed to a deviation.

A Permittee's failure to take the appropriate response step when an excursion of a compliance monitoring parameter has occurred is a deviation.

- (c) Emergencies shall be included in the Quarterly Deviation and Compliance Monitoring Report.

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)]
- (b) This permit shall be reopened and revised under any of the circumstances listed in IC 13-15-7-2 or if IDEM, OAM, 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, OAM, 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, OAM at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, may provide a shorter time period in the case of an emergency. [326 IAC 2-7-9(c)]

B.17 Permit Renewal [326 IAC 2-7-4]

- (a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAM, 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).

Request for renewal shall be submitted to:

Indiana Department of Environmental Management

Permits Branch, Office of Air Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

- (b) Timely Submittal of Permit Renewal [326 IAC 2-7-4(a)(1)(D)]
- (1) A timely renewal application is one that is:
- (A) Submitted at least nine (9) months prior to the date of the expiration of this permit; and
- (B) 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, OAM, on or before the date it is due.
- (2) If IDEM, OAM, upon receiving a timely and complete 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.
- (c) Right to Operate After Application for Renewal [326 IAC 2-7-3]
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, OAM, 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, OAM, any additional information identified as being needed to process the application.
- (d) United States Environmental Protection Agency Authority [326 IAC 2-7-8(e)]
If IDEM, OAM, fails to act in a timely way on a Part 70 permit renewal, the U.S. EPA may invoke its authority under Section 505(e) of the Clean Air Act to terminate or revoke and reissue a Part 70 permit.

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

- (a) The Permittee must comply with 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 Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

Any such application should be certified by the "responsible official" as defined by 326 IAC 2-7-1(34) only if a certification is required by the terms of the applicable rule.

- (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)(D)(i) 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]

- (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 approval required by 326 IAC 2-1.1 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 Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

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 which document, on a rolling five (5) year basis, all such changes and emissions trading that are subject to 326 IAC 2-7-

20(b), (c), or (e) and makes such records available, upon reasonable request, for public review.

Such records shall consist of all information required to be submitted to IDEM, OAM, in the notices specified in 326 IAC 2-7-20(b), (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) and the following additional conditions:
- (1) The permit shield, described in 326 IAC 2-7-15, shall not apply to any change made under 326 IAC 2-7-20(b).
 - (2) For each such Section 502(b)(10) of the Clean Air Act change, the required written notification shall include the following:
 - (i) A brief description of the change within the source;
 - (ii) The date on which the change will occur;
 - (iii) Any change in emissions; and
 - (iv) Any permit term or condition that is no longer applicable as a result of the change.
- 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).
- (c) Emission Trades [326 IAC 2-7-20(c)]
The Permittee may trade increases and decreases in emissions in 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)]
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, OAM, or U.S. EPA is required.
- (e) Backup fuel switches specifically addressed in, and limited under, Section D 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 Construction Permit Requirement [326 IAC 2]

A modification, construction, or reconstruction shall be approved if required by and in accordance with the applicable provisions of 326 IAC 2.

B.22 Inspection and Entry [326 IAC 2-7-6(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, OAM, 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) Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- (c) Inspect, at reasonable times, any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit;
- (d) Sample or monitor, at reasonable times, substances or parameters for the purpose of assuring compliance with this permit or applicable requirements; and
- (e) Utilize any photographic, recording, testing, monitoring, or other equipment for the purpose of assuring compliance with this permit or applicable requirements.
[326 IAC 2-7-6(6)]

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 Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

The application 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).

- (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)]

- (a) The Permittee shall pay annual fees to IDEM, OAM, within thirty (30) calendar days of receipt of a billing. If the Permittee does not receive a bill from IDEM, OAM 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 317-233-0425 (ask for OAM, Technical Support and Modeling Section), to determine the appropriate permit fee.

SECTION C SOURCE OPERATION CONDITIONS

Entire Source

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

C.1 PSD Major Source Status [326 IAC 2-2] [40 CFR 52.21]

The source-wide VOC usage shall be limited to 440 tons per twelve month period, rolled on a monthly basis. Therefore, the requirements of 326 IAC 2-2 (Prevention of significant Deterioration) and 40 CFR 52.21 do apply.

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 Exemptions), 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. The provisions of 326 IAC 9-1-2 are not federally enforceable.

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 Operation of Equipment [326 IAC 2-7-6(6)]

Except as otherwise provided in this permit, all air pollution control equipment listed in this permit and used to comply with an applicable requirement shall be operated at all times that the emission unit vented to the control equipment is in operation.

C.7 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61.140]

- (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 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.
- (c) 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 Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

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 14-10-4, 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) 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 that the inspector be accredited is federally enforceable.

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

C.8 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, OAM.

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 Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

no later than thirty-five (35) days prior to the intended test date. The Permittee shall submit a notice of the actual test date to the above address so that it is received at least two weeks prior to the test date.

- (b) All test reports must be received by IDEM, OAM within forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAM, if the source submits to IDEM, OAM, a reasonable written explanation within five (5) days prior to the end of the initial forty-five (45) day period.

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

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

C.9 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

Compliance with applicable requirements shall be documented as required by this permit. All monitoring and record keeping requirements not already legally required shall be implemented within ninety (90) days of permit issuance. 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 Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

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).

C.10 Monitoring Methods [326 IAC 3]

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

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

C.11 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 September 12, 1996.

- (b) If the ERP is disapproved by IDEM, OAM, the Permittee shall have an additional thirty (30) days to resolve the differences and submit an approvable ERP.
- (c) These ERPs shall state those actions that will be taken, when each episode level is declared, to reduce or eliminate emissions of the appropriate air pollutants.
- (d) Said ERPs shall also identify the sources of air pollutants, the approximate amount of reduction of the pollutants, and a brief description of the manner in which the reduction will be achieved.
- (e) Upon direct notification by IDEM, OAM, 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.12 Risk Management Plan [326 IAC 2-7-5(12)] [40 CFR 68.215]

If a regulated substance, subject to 40 CFR 68, is present at a source in more than a threshold quantity, 40 CFR 68 is an applicable requirement and the Permittee shall:

- (a) Submit:
 - (1) A compliance schedule for meeting the requirements of 40 CFR 68 by the date provided in 40 CFR 68.10(a); or
 - (2) As a part of the compliance certification submitted under 326 IAC 2-7-6(5), a certification statement that the source is in compliance with all the requirements of 40 CFR 68, including the registration and submission of a Risk Management Plan (RMP); and
 - (3) A verification to IDEM, OAM, that a RMP or a revised plan was prepared and submitted as required by 40 CFR 68.
- (b) Provide annual certification to IDEM, OAM, that the Risk Management Plan is being properly implemented.

All documents submitted pursuant to this condition shall include the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

C.13 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 corrective actions. The Permittee shall submit a description of these corrective actions to IDEM, OAM, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize emissions from the affected facility while the corrective actions are being implemented. IDEM, OAM shall notify the Permittee within thirty (30) days, if the corrective actions taken are deficient. The Permittee shall submit a description of additional corrective actions taken to IDEM, OAM within thirty (30) days of receipt of the notice of deficiency. IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.
- (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,

OAM that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAM may extend the retesting deadline. Failure of the second test to demonstrate compliance with the appropriate permit conditions may be grounds for immediate revocation of the permit to operate the affected facility.

The documents submitted pursuant to this condition do not 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.14 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) The Permittee shall submit an annual emission statement certified pursuant to the requirements of 326 IAC 2-6, that must be received by April 15 of each year and must comply with the minimum requirements specified in 326 IAC 2-6-4. The annual emission statement shall meet the following requirements:
 - (1) Indicate actual emissions of criteria pollutants from the source, in compliance with 326 IAC 2-6 (Emission Reporting);
 - (2) Indicate actual emissions of other regulated pollutants from the source, for purposes of Part 70 fee assessment.
- (b) The annual emission statement covers the twelve (12) consecutive month time period starting December 1 and ending November 30. The annual emission statement must be submitted to:

Indiana Department of Environmental Management
Technical Support and Modeling Section, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015
- (c) The annual 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, OAM, on or before the date it is due.

C.15 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]

- (a) With the exception of performance tests conducted in accordance with Section C-Performance Testing, all observations, sampling, maintenance procedures, and record keeping, required as a condition of this permit shall be performed at all times the equipment is operating at normal representative conditions.
- (b) As an alternative to the observations, sampling, maintenance procedures, and record keeping of subsection (a) above, when the equipment listed in Section D of this permit is not operating, the Permittee shall either record the fact that the equipment is shut down or perform the observations, sampling, maintenance procedures, and record keeping that would otherwise be required by this permit.
- (c) If the equipment is operating but abnormal conditions prevail, additional observations and sampling should be taken with a record made of the nature of the abnormality.

- (d) If for reasons beyond its control, the operator fails to make required observations, sampling, maintenance procedures, or record keeping, reasons for this must be recorded.
- (e) At its discretion, IDEM may excuse such failure providing adequate justification is documented and such failures do not exceed five percent (5%) of the operating time in any quarter.
- (f) Temporary, unscheduled unavailability of staff qualified to perform the required observations, sampling, maintenance procedures, or record keeping shall be considered a valid reason for failure to perform the requirements stated in (a) above.

C.16 General Record Keeping Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-6]

- (a) Records of all required monitoring data and support information 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 kept at the source location for a minimum of three (3) years and available upon the request of an IDEM, OAM, representative. 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 written request for records to the Permittee, the Permittee shall furnish the records to the within a reasonable time.
- (b) Records of required monitoring information shall include, where applicable:
 - (1) The date, place, and time of sampling or measurements;
 - (2) The dates analyses were performed;
 - (3) The company or entity performing the analyses;
 - (4) The analytic techniques or methods used;
 - (5) The results of such analyses; and
 - (6) The operating conditions existing at the time of sampling or measurement.
- (c) Support information shall include, where applicable:
 - (1) Copies of all reports required by this permit;
 - (b) All original strip chart recordings for continuous monitoring instrumentation;
 - (3) All calibration and maintenance records;
 - (4) Records of preventive maintenance shall be sufficient to demonstrate that failure to implement the Preventive Maintenance Plan did not cause or contribute to a violation of any limitation on emissions or potential to emit. To be relied upon subsequent to any such violation, these records may include, but are not limited to: work orders, parts inventories, and operator's standard operating procedures. Records of response steps taken shall indicate whether the response steps were performed in accordance with the Compliance Response Plan required by Section C - Compliance Monitoring Plan - Failure to take Response Steps, of this permit, and whether a deviation from a permit condition was reported. All records shall

briefly describe what maintenance and response steps were taken and indicate who performed the tasks.

- (d) All record keeping requirements not already legally required shall be implemented within ninety (90) days of permit issuance.

C.17 General Reporting Requirements [326 IAC 2-7-5(3)(C)]

- (a) The source shall submit the attached Quarterly Deviation and Compliance Monitoring Report or its equivalent. Any deviation from permit requirements, the date(s) of each deviation, the cause of the deviation, and the response steps taken must be reported. This report shall be submitted within thirty (30) days of the end of the reporting period.

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

- (b) The report required in (a) of this condition and reports required by conditions in Section D of this permit shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

- (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, OAM, on or before the date it is due.
- (d) Unless otherwise specified in this permit, any quarterly report shall be submitted within thirty (30) days of the end of the reporting period. The reports do not 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 date of issuance of this permit and ending on the last day of the reporting period. Reporting periods are based on calendar years.

Stratospheric Ozone Protection

C.18 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.

SECTION D.1

FACILITY CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: (The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

This application consists of a consolidation of multiple permits into a single source-wide permit and involves a relaxation of the previously established line by line production limitations in the construction permits issued for the source's two (2) plants Accra Pac and Health Care Industries. This relaxation will enable the source to use the full capacity of its production lines. The stationary source consists of the following emission units and pollution control devices:

- (a) VOC-Containing Propellant Handling Operations including bulk and smaller container unloading, storage, transfer and filling into aerosol product containers. The source has seven (7) aerosol product production lines with a total capacity of 420 million aerosol cans per year.
- (b) VOC-Containing Liquid Handling Operations including bulk and smaller container unloading, storage, transfer, mixing, and filling into liquid and aerosol product containers. The source has nine (9) liquid product filling lines in addition to the seven (7) aerosol product filling lines and all sixteen (16) lines involve VOC-containing liquid handling. The source can handle a maximum of 674,915,000 pounds per year of VOC-containing liquids.
- (c) Scrap Can Processing Operations including automatic and manual devices used to recover contents and allow recycling of scrap metal from aerosol cans from the production operations that are unusable. The manual devices utilize add-on canisters of activated carbon for VOC emission control. The capacity of the scrap can processing operations is limited by permit to less than 4,545,000 scrap cans processed per year (equivalent to less than 25 tons per year of VOC emissions).

Permitted Emission Units and Pollution Control Equipment

- (a) Accra Pac Facilities under Construction Permits and Registration Approvals CP039-3350- 00127 issued April 7, 1994; CP039-3682-00127 issued August 11, 1994; CP039-3681-00127 issued November 17, 1994; CP039-4129-00127 issued March 27, 1995 and CP039-4515-00127 issued September 22, 1995:
 - (1) Line 1, which consists of seven (7) open and closed mixing tanks, one (1) closed bowl liquid product filler, one (1) under the cup (UTC) propellant filler. This line is rated at 8,400 cans per hour (cans/hr).
 - (2) Line 2, which consists of three (3) closed top mixing tanks, one (1) closed bowl liquid product filler, one (1) UTC propellant filler, one (1) pressure propellant filler. This line is rated at 8,400 cans per hour (cans/hr).
 - (3) Line 3, which consists of one (1) closed bowl liquid product filler, and one (1) non-VOC propellant filler at a rate of 6,300 cans/hr.

- (4) Line 4, which consists of four (4) closed top mixing tanks, one (1) closed bowl and two (2) portable liquid product fillers, two (2) UTC VOC propellant fillers, two (2) VOC propellant pressure fillers, and two (2) non-VOC propellant fillers. This line is rated 15,120 cans per hour (cans/hr).
 - (5) Line 61, which consists of four (4) closed top mixing tanks, two (2) closed liquid product fillers, one (1) UTC propellant filler and one (1) pressure propellant filler. This line is rated at 7,500 cans/hr.
 - (6) Line 62, which consists of one (1) closed bowl liquid product filler. This line is rated at 7,500 cans/hr.
 - (7) Line 63, which consists of four (4) closed top mixing tanks, two (2) closed bowl and two (2) portable liquid product fillers, and one (1) UTC propellant filler. This line is rated at 7,500 cans/hour.
 - (8) Miscellaneous equipment including thirty-six (36) bulk VOC and non-VOC liquid storage tanks, fifteen (15) bulk VOC and non-VOC propellant storage tanks, seven (7) pre-mix tanks, seven (7) run/storage tanks, two (2) surge tanks for compounding areas, three spray-out booths, five (5) single-head recharge gassers, secondary packaging operations, labelers using hot melt adhesives, and can and carton coders.
- (b) Health Care Industries Facilities under Construction Permit CP039-3345-00212 issued April 15, 1994 and Registration Approval CP039-3791 issued July 26, 1994.
- (1) Eight (8) container filling and packaging operations, identified as Lines 51 through 58 and including seven (7) mixing/batch tanks, ten (10) liquid closed bowl fillers, one (1) liquid open bowl filler, and two (2) tube fillers.
 - (a) Line 51 is capable of filling 2,000 can/hr,
 - (b) Line 52 is capable of filling 600 cans/hr,
 - (c) Line 53 is capable of filling 4,500 cans/hr,
 - (d) Line 54 is capable of filling 600 cans/hr,
 - (e) Line 55 is capable of filling 3,750 cans/hr,
 - (f) Line 56 is capable of filling 2,100 cans/hr,
 - (g) Line 57 is capable of filling 2,100 cans/hr,
 - (h) Line 58 is capable of filling 2,100 cans/hr.
 - (2) One (1) aerosol can filling line 50, which is capable of filling 4,200 cans/hr.
 - (3) Miscellaneous equipment including twenty-eight (28) VOC and non-VOC liquid pre-mix, run and storage tanks; two VOC propellant storage tanks, and can and carton coders.

GENERAL CONSTRUCTION CONDITIONS

D.1.1 Permit No Defense [IC 13]

This approval to construct does not relieve the Permittee of the responsibility to comply with the provisions of the Indiana Environmental Management Law (IC 13-11 through 13-20; 13-22 through 13-25; and 13-30), the Air Pollution Control Law (IC 13-17) and the rules promulgated thereunder, as well as other applicable local, state, and federal requirements.

D.1.2 Definitions [326 IAC 2-7-1]

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

Effective Date of the Permit

- D.1.3 Pursuant to 40 CFR Parts 124.15 124.19 and 124.20, the effective date of this permit will be thirty-three (33) days from its issuance.
- D.1.4 All requirements of these construction conditions shall remain in effect unless modified in a manner consistent with procedures established for modifications pursuant to 326 IAC 2.

Operation Conditions

Emissions Limitation and Standards

D.1.5 BACT Minor Limitation [326 IAC 8-1-6]

The number of cans crushed that were filled with VOC shall be limited to less than 4,545,000 per twelve-month period, rolled on a monthly basis. Based on the emission factor, Ef of 0.011 pounds of VOC per can crushed shall result in VOC emissions less than 25 tons per twelve month period. Compliance with this condition will make 326 IAC 8-1-6 not applicable (General Reduction Requirements).

D.1.6 PSD BACT Determination [326 IAC 2-2, and 40 CFR 52.21]

Pursuant to 326 IAC 2-2, and 40 CFR 52.21, the BACT determined for this liquid and aerosol can filling plant shall be the following:

- (a) The pounds of VOC compounded and filled, including the propellant filled into containers per month; the number of cans filled with VOC per month; the number of can crushed that were filled with VOC; the cubic feet of natural gas used per month shall be limited such that the summation of the emissions calculated using the equation below shall not exceed a VOC emissions limit of 440 tons per twelve-month period, rolled on a monthly basis.

$$\text{VOC Emission} = [(\text{lbs. VOC compounded \& filled/month}) \times (\text{Ef, 0.03 lbVOC/gal VOC}) \\ + (\text{\# cans filled with VOC/month}) \times (\text{Ef, 0.0013 lb VOC/can}) + (\text{\# cans crushed filled with VOC}) \times (\text{Ef, 0.011 lb VOC/can})]$$

- (b) Pressure filling or through the valve filling method shall be utilized at all times when the product being filled allows for this method.
- (c) When pressure filling can not be utilized, Under the Cup (UTC) fill method with vapor reclaim or the use of equivalent means of emission reduction shall be utilized.

- (d) Continue enclosure of open bowl liquid filling reservoirs, wherever possible.
- (e) Utilize raw materials having the lowest feasible VOC content and vapor pressure, whenever possible.
- (f) Continue movement toward consumer products that contain levels of lower VOCs and lower VOC composite partial vapor pressures.

Compliance Determination Requirements

D.1.7 Volatile Organic Compounds

- (a) Compliance with the VOC content and usage limitations contained in Condition D.1.6 shall be determined pursuant to 326 IAC 8-1-4(a)(3)(A) using formulation data supplied by the VOL manufacturer. However, IDEM, OAM, reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.
- (b) The Permittee is not required by this permit to verify the emission factors used herein through compliance tests. However, the Commissioner reserves the right to invoke its authority under 326 IAC 2-1.1-11 to require stack testing, monitoring or reporting at any time to assure compliance with all applicable requirements. If testing is required by IDEM compliance with the VOC limits specified in Condition D.1.6 shall be determined by a performance test conducted in accordance with Section C - Performance Testing.

D.1.8 Activated Carbon Cartridges

- (a) The activated carbon cartridges shall be in operation at all times when using the manual devices and crushing VOC containing cans.
- (b) The activated carbon cartridges shall be replaced in accordance with manufacturer's instructions.

D.1.9 326 IAC 12, and NSPS, 40 CFR § 60.110b and 60.116(b)(a) and (b), Subpart Kb

Pursuant to 326 IAC 12, and 40 CFR § 60.110b and 60.116(b)(a) and (b), Subpart Kb, the Permittee shall keep readily accessible records showing the dimensions of storage tanks A1, A6, A7, and A13 and an analysis showing their capacities for the life of the subject vessels.

Record Keeping and Reporting Requirements [326 IAC 2-8-4(3)] [326 IAC 2-8-16]

D.1.10 Record Keeping Requirements

- (a) To document compliance with Conditions D.1.5 and D.1.6, the Permittee shall maintain records in accordance with (1) through (4) below. Records maintained for (1) through (4) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC emission limits established in Conditions D.1.5 and D.1.6
 - (1) The amount and VOC content of the Volatile Organic Liquid (VOL) product filled. Records shall include material safety data sheets (MSDS), product formulation information, VOL compounded/filled and company product records necessary to verify the type and amount used.
 - (2) The total VOC compounded/filled for each month,
 - (3) The number/amount of cans filled with VOC propellant, and
 - (4) The weight of VOC emitted for each compliance period.
- (b) Pursuant to 40 CFR, Part 60.116b, Subpart Kb, the owner/operator of the five (5) storage tanks, identified as A1, A6, A7, A12 and A13 with a capacity of 15,000 gallon each shall keep records showing their dimensions and their capacities for the life of the subject storage vessels.
- (c) Records shall be made on the date when activated carbon cartridges for the manual can crushing devices are replaced.
- (d) All records shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

D.1.11 Reporting Requirements

A quarterly summary of the information to document compliance with Conditions D.1.5, and D.1.6 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.

SECTION D.2

FACILITY CONDITIONS

Facility Description [326 IAC 2-7-5(15)]: (The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Insignificant Activities:

two (2) natural gas-fired boilers, identified as boilers #1 and #2, each with a heat input capacity of 8.37 mmBtu/hr, and one (1) natural gas-fired boiler #3, with a heat input capacity of 6.28 mmBtu/hr. One (1) natural gas-fired water heater, with heat capacity of 1.5 mmBtu/hr, and two (2) natural gas-fired boilers, one boiler is rated at 1.05 mmBtu/hr and the other is rated at 2.65 mmBtu/hr.

Emissions Limitation and Standards

D.2.1 Particulate Matter Limitation

That pursuant to 326 IAC 6-2 (Particulate Emissions Limitations for Sources of Indirect Heating) the following boilers shall be limited as follows:

Boiler ID	Capacity (million Btu/hr)	PM Allowable Emissions (lb/mmBtu)	PM Allowable Emissions (lb/hour)
Boiler #1 of APG	8.37	0.6	5.0
Boiler #2 of APG	6.28	0.6	3.8
Boiler #1 of HCl	1.05	0.6	0.63
Boiler #3 of HCl	1.5	0.45	0.67
Boiler #2 of APG	8.37	0.45	3.8
Boiler #2 of HCl	2.65	0.45	1.2

Compliance Determination Requirements

D.2.2 Testing Requirements [326 IAC 2-7-6(1),(6)][326 IAC 2-1.1-11]

The Permittee is not required to test these boilers by this permit. However, the Commissioner reserves the right to invoke its authority under 326 IAC 2-1.1-11 to require stack testing, monitoring or reporting at any time to assure compliance with all applicable requirements. If testing is required by IDEM compliance with the PM limit specified in Condition D.2.2 shall be determined by a performance test conducted in accordance with Section C - Performance Testing.

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

Quarterly Summary

Source Name: Accra Pac Group, Inc.
Source Address: 2730 Middlebury Street, Elkhart, Indiana 46515
Mailing Address: P. O. Box 878, Elkhart, Indiana 46515
PSD and Part 70 Permit No.: 039-6875-00127
Facility: Can Crushing operation
Parameter: VOC
Limit: The number of cans crushed that were filled with VOC shall be limited to less than 4,545,000 per twelve-month period, rolled on a monthly basis. Based on the emission factor, Ef of 0.011 pounds of VOC per can crushed shall result in VOC emissions less than 25 tons per twelve month period.

Month: _____ Year: _____

Month	Column 1		Column 2	
	No. of Cans Crushed This Month	VOC Emission This Month	No. of Cans Crushed Past 12 Months	VOC Emission Past 12 Months

9 No deviation occurred in this month.

9 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 MANAGEMENT
COMPLIANCE DATA SECTION**

Quarterly Report

Source Name: Accra Group, Inc.
Source Address: 2730 Middlebury Street, Elkhart, Indiana 46515
Mailing Address: P. O. Box 878, Elkhart, Indiana 46515
PSD and Part 70 Permit No.: 039-6875-00127
Facility: Sourcewide
Pollutant: VOC
Limit: 440 tons of VOC emissions per 12-month period, based on a monthly rolling. This (VOC) emission limitation shall be determined using the following emission factors:

Facility/Operation	VOC Emission Factor
VOL Compounding and Filling	0.03 lb VOC/gal VOC
Propellant Filling	0.0013 lb VOC/can filled

Year: _____

Operations	VOC Propellant Filling		VOL Compounding and Filling	
	No. of cans Filled	VOC Emissions (Tons)	MM gal VOC Compounded and Filled	VOC Emissions (Tons)
This Month				
Past 12 Months				

Sourcewide VOC emissions shall be determined using the following equation:

$$\text{VOC Emission} = [(\text{lbs. VOC compounded \& filled/month}) \times (\text{Ef, 0.03 lbVOC/gal VOC}) + (\text{\# cans filled with VOC/month}) \times (\text{Ef, 0.0013 lb VOC/can}) + (\text{\# cans crushed filled with VOC}) \times (\text{Ef, 0.011 lb VOC/can})]$$

Submitted by: _____
Title/Position: _____
Signature: _____
Date: _____
Phone: _____

Attach a signed certification to complete this report.

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

**PSD and PART 70 OPERATING PERMIT
CERTIFICATION**

Source Name: Accra Group, Inc.
Source Address: 2730 Middlebury Street, Elkhart, Indiana 46515
Mailing Address: P. O. Box 878, Elkhart, Indiana 46515
PSD and Part 70 Permit No.: 039-6875-00127

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:

- 9 Annual Compliance Certification Letter
- 9 Test Result (specify) _____
- 9 Report (specify) _____
- 9 Notification (specify) _____
- 9 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:

Date:

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

**PART 70 OPERATING PERMIT
QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT**

Source Name: Accra Group, Inc.
Source Address: 2730 Middlebury Street, Elkhart, Indiana 46515
Mailing Address: P. O. Box 878, Elkhart, Indiana 46515
PSD and Part 70 Permit No.: 039-6875-00127

Months: _____ to _____ Year: _____

Page 1 of 2

This report is an affirmation that the source has met all the requirements stated in this permit. 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".

9 NO DEVIATIONS OCCURRED THIS REPORTING PERIOD.

9 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.

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR MANAGEMENT
COMPLIANCE BRANCH
P.O. Box 6015
100 North Senate Avenue
Indianapolis, Indiana 46206-6015
Phone: 317-233-5674
Fax: 317-233-5967**

**PART 70 OPERATING PERMIT
EMERGENCY OCCURRENCE REPORT**

Source Name: Accra Group, Inc.
Source Address: 2730 Middlebury Street, Elkhart, Indiana 46515
Mailing Address: P. O. Box 878, Elkhart, Indiana 46515
PSD and Part 70 Permit No.: 039-6875-00127

This form consists of 2 pages

Page 1 of 2

- 9** This is an emergency as defined in 326 IAC 2-7-1(12)
- ☐ The Permittee must notify the Office of Air Management (OAM), within four (4) business hours (1-800-451-6027 or 317-233-5674, ask for Compliance Section); and
 - ☐ The Permittee must submit notice in writing or by facsimile within two (2) days (Facsimile Number: 317-233-5967), 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 Management

Addendum to the Technical Support Document for a PSD and Part 70 Operating Permit

Source Name: Accra Pac Group, Inc.
 Source Location: 2730 Middlebury Street, Elkhart, Indiana 46515
 County: Elkhart
 SIC Code: 7389
 PSD and Part 70 Permit No.: 039-6875-00434
 Permit Reviewer: Aida De Guzman

On May 20, 2000, the Office of Air Management (OAM) had a notice published in the Elkhart Truth, Elkhart, Indiana, stating that Accra Pac Group, Inc. had applied for a PSD and a Part 70 Operating Permit for the consolidation of multiple permits into a single source-wide permit and involves a relaxation of the previously established line by line production limitations in the construction permits issued for the source's two (2) plants Accra Pac and Health Care Industries. This relaxation will enable the source to use the full capacity of its production lines. The notice also stated that OAM proposed to issue a permit for this operation and provided information on how the public could review the proposed permit and other documentation. Finally, the notice informed interested parties that there was a period of thirty (30) days to provide comments on whether or not this permit should be issued as proposed.

On June 19, 2000, Accra Pac Group, Inc. submitted comments on the proposed PSD/Part 70 permit. The summary of the comments and corresponding responses is as follows (changes are bolded and deletions are struck-through for emphasis):

Comment 1: The source has previously requested section B.16 be removed. It is unduly burdensome, unnecessary, and not authorized under 326 IAC 2-7-5(3)(C). 326 IAC 2-7-16 covers emergencies lasting more than one hour, requires notification within four daytime business hours and a written follow-up within two business days. These requirements fulfill the requirements of 326 IAC 2-7-5(3)(C)(ii). 326 IAC 2-7-5(3)(C)(i) and (ii) require all other deviations to be reported in the monitoring reports to be submitted "at least every six months". Section C.17 of the permit requires these reports to be submitted quarterly. There is nothing in these provisions, or in any other provisions of 326 IAC 2-7, which requires or justifies a requirement for interim reporting of deviations which do not constitute emergencies. Section B.16 merely creates unnecessary and duplicative paperwork.

Response 1: Condition B.16, now B.15 was revised as follows:

B.16 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 probable cause of such deviations, and any response steps or preventive measures taken shall be reported to:

Indiana Department of Environmental Management
 Compliance Branch, Office of Air Management
 100 North Senate Avenue, P.O. Box 6015

Indianapolis, Indiana 46206-6015

~~within ten (10) calendar days from the date of the discovery of the deviation.~~ **using the attached Quarterly Deviation and Compliance Monitoring Report, or its equivalent. 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.**

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

- (b) A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit or a rule. It does not include:
- (1) An excursion from compliance monitoring parameters as identified in Section D of this permit unless tied to an applicable rule or limit; or
 - ~~(2) An emergency as defined in 326 IAC 2-7-1(12); or~~
 - ~~(3) Failure to implement elements of the Preventive Maintenance Plan unless such failure has caused or contributed to a deviation.~~
 - ~~(4) Failure to make or record information required by the compliance monitoring provisions of Section D unless such failure exceeds 5% of the required data in any calendar quarter.~~

A Permittee's failure to take the appropriate response step when an excursion of a compliance monitoring parameter has occurred is a deviation.

- (c) ~~Written notification shall be submitted on the attached Emergency/Deviation Occurrence Reporting Form or its substantial equivalent. The notification does not need to be certified by the “responsible official” as defined by 326 IAC 2-7-1(34).~~
Emergencies shall be included in the Quarterly Deviation and Compliance Monitoring Report.
- (d) ~~Proper notice submittal under 326 IAC 2-7-16 satisfies the requirement of this subsection.~~

Comment 2: Please delete “April 15 of” in condition C.14(a), and substitute “the applicable due date”. There have been suggestions that 326 IAC 2-6 may be amended to remove the April 15 date for areas redesignated attainment for ozone.

Response 2: No change to 326 IAC 2-6 was included in the December 1998 rule revision. The condition reflects current rule language; therefore, there has been no change to this condition.

Comment 3: In condition D.1.6(a), the cubic feet of natural gas used per month should be deleted from the description of the VOC emission limitation, and the cubic feet of natural gas used per month and the storage tank emissions per month should be deleted from the VOC emission calculations. Natural gas is only utilized as a fuel in insignificant/ exempt

activities such as space heaters, water heaters, boilers, etc. and these devices do not have gas meters dedicated to tracking the usage of these individual devices. The potential VOC emissions associated to natural gas combustion are only 0.7 tons/year, as indicated in the TSD. With respect to the storage tanks, the effort involved in tracking materials (VOC content and throughput) and calculating emissions is estimated to be at least 50 to 60 man-hours per month. The potential VOC emissions are only 2.9 tons/year, as indicated in the TSD. Clearly it would impose an unreasonable burden on the source to require monthly tracking and reporting of VOC emissions associated with natural gas combustion and storage tanks when the potential emissions are so low. If necessary, the source would agree to including a constant monthly amount of VOC emissions in each report to account for these emissions on a worst case basis:
(0.7 tons/yr natural gas + 2.9 tons/yr storage tanks) / 12 months = 0.3 ton/month.

Response 3: 326 IAC 2-2 and 40 CFR 52.21 require the source emissions to be less than 444 tons per year. This was the established BACT VOC emissions limit under Prevention of Significant Deterioration (PSD) rules. VOC from all emitting facilities, including otherwise insignificant facilities, must be taken into account. To avoid the record keeping of fuel usages and throughput from these insignificant activities, their potential VOC emissions of 3.6 tons per year will be discounted from the overall limit of 444 tons per year. Therefore, the sourcewide VOC limit excluding the natural gas combustion and storage tanks VOC emissions would be 440 tons per year. Condition D.1.5 was revised as follows:

D.1.6 PSD BACT Determination [326 IAC 2-2, and 40 CFR 52.21]

Pursuant to 326 IAC 2-2, and 40 CFR 52.21, the BACT determined for this liquid and aerosol can filling plant shall be the following:

- (a) The pounds of VOC compounded and filled, including the propellant filled into containers per month; the number of cans filled with VOC per month; the number of can crushed that were filled with VOC; the cubic feet of natural gas used per month shall be limited such that the summation of the emissions calculated using the equation below shall not exceed a VOC emissions limit of ~~444~~ 0 tons per twelve-month period, rolled on a monthly basis.

$$\text{VOC Emission} = [(\text{lbs. VOC compounded \& filled/month}) \times (\text{Ef, 0.03 lbVOC/gal VOC}) + (\text{\# cans filled with VOC/month}) \times (\text{Ef, 0.0013 lb VOC/can}) + (\text{\# cans crushed filled with VOC}) \times (\text{Ef, 0.011 lb VOC/can}) + (\text{cf natural gas used/month}) \times (\text{Ef, lb VOC/cf})] + (\text{storage tanks emissions/month})]$$

~~Note: Storage tank emission, shall be calculated using the EPA Tanks Program.~~

- (b) Pressure filling or through the valve filling method shall be utilized at all times when the product being filled allows for this method.
- (c) When pressure filling can not be utilized, Under the Cup (UTC) fill method with vapor reclaim or the use of equivalent means of emission reduction shall be utilized.
- (d) Continue enclosure of open bowl liquid filling reservoirs, wherever possible.

- (e) Utilize raw materials having the lowest feasible VOC content and vapor pressure, whenever possible.
- (f) Continue movement toward consumer products that contain levels of lower VOCs and lower VOC composite partial vapor pressures.

Comment 4: Sections (c) and (d) of Conditions D.1.7 should be redesignated (a) and (b). In addition, the present subsection (d) would permit IDEM to require testing without providing Accra Pac Group an opportunity to contest, or seek review of the decision. This would violate due process. Add a sentence at the end which reads: "Permittee may seek administrative or judicial review of any IDEM determination that such testing is necessary".

Response 4: The Commissioner reserves the right to invoke its authority under 326 IAC 2-1.1-11 to require stack testing, monitoring or reporting at any time to assure compliance with all applicable requirements.

Condition D.1.7 Section (d) was revised as follows:

The Permittee is not required by this permit to verify the emission factors used herein through compliance tests. However, the Commissioner reserves the right to invoke its authority under 326 IAC 2-1.1-11 to require stack testing, monitoring or reporting at any time to assure compliance with all applicable requirements. If testing is required by IDEM compliance with the VOC limits specified in Condition D.1.6 shall be determined by a performance test conducted in accordance with Section C - Performance Testing.

Comment 5: Condition D.1.8(a), the language "using the manual devices and crushing VOC containing cans" needs to be added to the end of this sentence because the automated can crushing device does not use activated carbon cartridges and only VOC-containing cans are regulated. Also, the word "filters" should be changed to "cartridges" to be consistent with D.1.8(b).

Response 5: Condition D.1.8 was revised as follows:

D.1.8 Activated Carbon ~~Filters~~ Cartridges

- (a) The activated carbon ~~filters~~ **cartridges** shall be in operation at all times when using the manual devices and ~~can~~ **crushing VOC containing cans** ~~is being performed~~.
- (b) The activated carbon cartridges shall be replaced in accordance with manufacturer's instructions.

Comment 6: The requirements in Condition D.1.10(a)(3) and D.1.10(a)(6) should be eliminated, and those in D.1.10(b) should be modified. With respect to the VOC stored in the storage tanks, please refer to the comment for Condition D.1.6(a) - it is unreasonable burden given the minimal amount of potential emissions, and it can be accounted for by using a constant monthly amount for worst case emissions. With respect to the UTC filling method, the emission factor being utilized already incorporates both UTC and PF gassing on a worst case basis, and the use of vapor reclaim or an equivalent means of emission reduction for UTC gassing is already incorporated in Condition D.1.6 of the permit. Consequently, keeping records on the times when UTC gassing is utilized and on the

means of control used is an unnecessary burden that provides no useful information. With respect to Condition D.1.10(b), the requirement for keeping records on tank dimensions should be changed from "for the life of the source" to "so long as the subject tank is in service". The tank dimension records should not have to be maintained after the tank is taken out of service.

Response 6: Condition D.1.10(a)(3) was deleted, due to the changes made to Condition D.1.6. See related Response 3.

Condition D.1.10(a)(6) is part of the PSD BACT. In order for the source to demonstrate compliance with the established BACT, this condition is necessary. This condition was not deleted in the permit.

Condition D.1.10(b) will be revised to change "for the life of the source" to "for the life of the subject storage vessels".

Revision to Condition D.1.10 Record Keeping requirements is as follows:

D.1.10 Record Keeping Requirements

(a) To document compliance with Conditions D.1.5 and D.1.6, the Permittee shall maintain records in accordance with (1) through (6 4) below. Records maintained for (1) through (6 4) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC emission limits established in Conditions D.1.5 and D.1.6

(1) The amount and VOC content of the Volatile Organic Liquid (VOL) product filled. Records shall include material safety data sheets (MSDS), product formulation information, VOL compounded/filled and company product records necessary to verify the type and amount used.

(2) The total VOC compounded/filled for each month,

~~(3) The total VOC stored into the twenty two (22) storage tanks for each month,~~

(4 3) The number/amount of cans filled with VOC propellant,

(5 4) The weight of VOC emitted for each compliance period, and

~~(6) The times when Under The Cup (UTC) filling method is utilized, and indicate the method of VOC control used.~~

(b) Pursuant to 40 CFR, Part 60.116b, Subpart Kb, the owner/operator of the five (5) storage tanks, identified as A1, A6, A7, A12 and A13 with a capacity of 15,000 gallon each shall keep records showing their dimensions and their capacities for the life of the ~~source~~ **subject storage vessels**.

(c) Records shall be made on the date when activated carbon cartridges for the manual can crushing devices are replaced.

(d) All records shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

Comment 7: For Condition D.2.2, see the objection to Condition D.1.7. Also, any testing requirements for insignificant activities would be arbitrary and capricious. This condition should be deleted.

Response 7: 326 IAC 6-2 (Particulate Emissions for Indirect Heating Facilities) is applicable to the six (6) boilers which are classified as insignificant activities for the Title V program. 326 IAC 2-7-5(3)A dictates that the permit contain all emissions monitoring and testing methods required under the applicable requirements. Since these boilers are insignificant the permit does not require testing for these boilers. However, the Commissioner reserves the right to invoke its authority under 326 IAC 2-1.1-11 to require stack testing, monitoring or reporting at any time to assure compliance with all applicable requirements.

Comment 8: The "Quarterly Summary" on page 36 of 42 of the draft permit should be modified by eliminating column 2 (previous 11 months data). Since data on the current month and the past 12 months are provided, there is no need to report data on the previous 11 months. With respect to the "Quarterly Report" on page 37 of 41, the columns for "Natural Gas Usage" and VOC Stored into Storage Tanks" should be eliminated, and the emission calculation should be correspondingly modified, for the reasons given in the comments in condition D.1.6. Also, the "Total" row should be eliminated to avoid erroneous totaling of the current month and past 12 months data.

Response 8: The Quarterly Summary on page 36 of 41 was revised and column 2 (darken) was deleted. The word "Summary" was changed to "Report". The column for the natural gas usage, and VOC stored into the storage tanks (darken) in the Quarterly Report on page 37 of 41 were deleted.

Month	Column 1		Column 2		Column 1 + 2	
	No. of Cans Crushed This Month	VOC Emission This Month	No. of Cans Crushed Previous 11 Months	VOC Emissions Previous 11 Months	No. of Cans Crushed Past 12 Months	VOC Emission Past 12 Months

Operations	VOC Propellant Filling		VOL Compounding and Filling		Natural Gas Usage		VOC Stored Into Storage Tanks	
	No. of cans Filled	VOC Emissions (Tons)	MM gal VOC Compounded and Filled	VOC Emissions (Tons)	Cubic Feet of Natural Gas Usage	VOC Emissions (Tons)	Lb of VOC Stored	VOC Emissions (Tons)
This Month								
Past 12 Months								
TOTAL								

Comment 9: Subsection 4(c) in the Affidavit of Construction should be modified to be consistent with Condition D.1.5 of the permit (limit of less than 4,545,000 cans filled with VOC crushed per 12 month period, equivalent to less than 25 tons of VOC emissions per 12 month period). Also, the subpart designations used should be changed to eliminate duplications and confusion (see subsection 4 in particular).

Response 9: The can crushing operation was limited to less than 25 tons of VOC per year, which is an equivalent of 4,545,000 cans filled with VOC per year (see below calculations)

25 tons/yr * 2000 lb/ton * can/0.011lb VOC = 4,545,000 cans/yr

The capacity of the can crushing listed in subsection 4(c) of the Affidavit of Construction was revised to use the capacity limit of less than 4,545,000 cans/yr.

Upon further review, the OAM has decided to make the following revisions to the permit (bolded language has been added, the language with a line through it has been deleted):

- (a) Condition B.1 Permit No Defense in the proposed permit was deleted in the final permit. Subsequent conditions were re-numbered accordingly.
- (b) Condition B.13, Emergency Provisions, now B.12 was revised as follows:

B.1-3 2 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 provided in 326 IAC 2-7-16.
- (b) An emergency, as defined in 326 IAC 2-7-1(12), constitutes an affirmative defense to an action brought for noncompliance with a health-based or 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, OAM, 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 Management,
Compliance Section), or
Telephone Number: 317-233-5674 (ask for Compliance Section)
Facsimile Number: 317-233-5967

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

Indiana Department of Environmental Management
Compliance Branch, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

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) for sources subject to this rule after the effective date of this rule. This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.
- (e) IDEM, OAM, may require that the Preventive Maintenance Plans required under 326 IAC 2-7-4-(c)(10) be revised in response to an emergency.
- (f) Failure to notify IDEM, OAM, by telephone or facsimile of an emergency lasting more than one (1) hour in ~~compliance~~ **accordance** with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-7 and any other applicable rules.
- (g) Operations may continue during an emergency only if the following conditions are met:
 - (1) 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.
 - (2) If an emergency situation causes a deviation from a health-based limit, the Permittee may not continue to operate the affected emissions facilities unless:
 - (A) The Permittee immediately takes all reasonable steps to correct the emergency situation and to minimize emissions; and
 - (B) Continued operation of the facilities is 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.

Any operation shall continue no longer than the minimum time required to prevent the situations identified in (g)(2)(B) of this condition.

(c) Condition B.14, now B.13 was revised as follows:

B.14 13 Permit Shield [326 IAC 2-7-15]

(a) ~~—This condition provides a permit shield as addressed in 326 IAC 2-7-15.~~

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 date of permit issuance, 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 date of issuance of this permit unless this permit has been modified to reflect such new requirements.

- (b) This permit shall be used as the primary document for determining compliance with applicable requirements established by previously issued permits. ~~Compliance with the conditions of this permit shall be deemed in compliance with any applicable requirements as of the date of permit issuance, provided that:~~ **All previously issued operating permits are superseded by this permit.**
- ~~(1) The applicable requirements are included and specifically identified in this permit;~~
~~or~~
- ~~(2) The permit contains an explicit determination or concise summary of a determination that other specifically identified requirements are not applicable.~~
- (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, OAM, 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 this permit's issuance;
 - (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, OAM, 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, OAM, has issued the modification. [326 IAC 2-7-12(b)(7)]
- (d) Condition C.17 General Reporting Requirements was revised as follows:

C.17 General Reporting Requirements [326 IAC 2-7-5(3)(C)]

- (a) ~~To affirm that the source has met all the compliance monitoring requirements stated in this permit the source shall submit a Semi-Annual Compliance Monitoring Report. Any deviation from the requirements and the date(s) of each deviation must be reported.~~
The source shall submit the attached Quarterly Deviation and Compliance Monitoring Report or its equivalent. Any deviation from permit requirements, the date(s) of each deviation, the cause of the deviation, and the response steps taken must be reported. This report shall be submitted within thirty (30) days of the end of the reporting period.

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

- (b) The report required in (a) of this condition and reports required by conditions in Section D of this permit shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Management
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

- (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, OAM, on or before the date it is due.

- (d) Unless otherwise specified in this permit, any quarterly report shall be submitted within thirty (30) days of the end of the reporting period. The reports do not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

- ~~(e) All instances of deviations as described in Section B-Deviations from Permit Requirements Conditions must be clearly identified in such reports. The Emergency/Deviation Occurrence Report does not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).~~

-

- ~~(f) Any corrective actions or response steps taken as a result of each deviation must be clearly identified in such reports.~~

- (g) The first report shall cover the period commencing on the date of issuance of this permit and ending on the last day of the reporting period. **Reporting periods are based on calendar years.**

Indiana Department of Environmental Management

Office of Air Management

Technical Support Document (TSD) for PSD and Part 70 Permit

Source Background and Description

Source Name:	Accra Pac Group, Inc.
Source Location:	2730 Middlebury Street Elkhart , Indiana 46515
County:	Elkhart
PSD/Part 70 Permit:	039-6875-00434
SIC Code:	7389
Permit Reviewer:	Aida De Guzman

The Office of Air Management (OAM) has reviewed a combined PSD and a Part 70 permit application from Accra Pac Group, Inc. which consists of a consolidation of multiple permits into a single source-wide permit and involves a relaxation of the previously established line by line production limitations in the construction permits issued for the source's two (2) plants Accra Pac and Health Care Industries. This relaxation will enable the source to use the full capacity of its production lines. The stationary source consists of the following emission units and pollution control devices:

- (a) VOC-Containing Propellant Handling Operations including bulk and smaller container unloading, storage, transfer and filling into aerosol product containers. The source has seven (7) aerosol product production lines with a total capacity of 420 million aerosol cans per year.
- (b) VOC-Containing Liquid Handling Operations including bulk and smaller container unloading, storage, transfer, mixing, and filling into liquid and aerosol product containers. The source has nine (9) liquid product filling lines in addition to the seven (7) aerosol product filling lines and all sixteen (16) lines involve VOC-containing liquid handling. The source can handle a maximum of 674,915,000 pounds per year of VOC-containing liquids.
- (c) Scrap Can Processing Operations including automatic and manual devices used to recover contents and allow recycling of scrap metal from aerosol cans from the production operations that are unusable. The manual devices utilize add-on canisters of activated carbon for VOC emission control. The capacity of the scrap can processing operations is limited by permit to 4,320,000 scrap cans processed per year (equivalent to 24 tons per year of VOC emissions).

Permitted Emission Units and Pollution Control Equipment

- (a) Accra Pac Facilities under Construction Permits and Registration Approvals CP039-3350-00127 issued April 7, 1994; CP039-3682-00127 issued August 11, 1994; CP039-3681-00127 issued November 17, 1994; CP039-4129-00127 issued March 27, 1995 and CP039-4515-00127 issued September 22, 1995:
 - (1) Line 1, which consists of seven (7) open and closed mixing tanks, one (1) closed bowl liquid product filler, one (1) under the cup (UTC) propellant filler. This line is rated at 8,400 cans per hour (cans/hr). This line was constructed in 1976.

- (2) Line 2, which consists of three (3) closed top mixing tanks, one (1) closed bowl liquid product filler, one (1) UTC propellant filler, one (1) pressure propellant filler. This line is rated at 8,400 cans per hour (cans/hr). This line was constructed in 1976.
 - (3) Line 3, which consists of one (1) closed bowl liquid product filler, and one (1) non-VOC propellant filler at a rate of 6,300 cans/hr. This line was constructed in 1989.
 - (4) Line 4, which consists of four (4) closed top mixing tanks, one (1) closed bowl and two (2) portable liquid product fillers, two (2) UTC VOC propellant fillers, two (2) VOC propellant pressure fillers, and two (2) non-VOC propellant fillers. This line is rated 15,120 cans per hour (cans/hr). This line was constructed in 1989.
 - (5) Line 61, which consists of four (4) closed top mixing tanks, two (2) closed liquid product fillers, one (1) UTC propellant filler and one (1) pressure propellant filler. This line is rated at 7,500 cans/hr. This line was constructed in 1993.
 - (6) Line 62, which consists of one (1) closed bowl liquid product filler. This line is rated at 7,500 cans/hr. This line was constructed in 1993.
 - (7) Line 63, which consists of four (4) closed top mixing tanks, two (2) closed bowl and two (2) portable liquid product fillers, and one (1) UTC propellant filler. This line is rated at 7,500 cans/hour.
 - (8) Miscellaneous equipment including thirty-six (36) bulk VOC and non-VOC liquid storage tanks, fifteen (15) bulk VOC and non-VOC propellant storage tanks, seven (7) pre-mix tanks, seven (7) run/storage tanks, two (2) surge tanks for compounding areas, three spray-out booths, five (5) single-head recharge gassers, secondary packaging operations, labelers using hot melt adhesives, and can and carton coders.
- (b) Health Care Industries Facilities under Construction Permit CP039-3345-00212 issued April 15, 1994 and Registration Approval CP039-3791 issued July 26, 1994.
- (1) Eight (8) container filling and packaging operations, identified as Lines 51 through 58 and including seven (7) mixing/batch tanks, ten (10) liquid closed bowl fillers, one (1) liquid open bowl filler, and two (2) tube fillers.
 - (a) Line 51 is capable of filling 2,000 can/hr,
 - (b) Line 52 is capable of filling 600 cans/hr,
 - (c) Line 53 is capable of filling 4,500 cans/hr,

- (d) Line 54 is capable of filling 600 cans/hr,
 - (e) Line 55 is capable of filling 3,750 cans/hr,
 - (f) Line 56 is capable of filling 2,100 cans/hr,
 - (g) Line 57 is capable of filling 2,100 cans/hr,
 - (h) Line 58 is capable of filling 2,100 cans/hr.
- (2) One (1) aerosol can filling line 50, which is capable of filling 4,200 cans/hr.
- (3) Miscellaneous equipment including twenty-eight (28) VOC and non-VOC liquid pre-mix, run and storage tanks; two VOC propellant storage tanks, and can and carton coders.

Insignificant Activities

- (a) A powder filling operation rated at 411 pounds per hour, which is used on any one of the fourteen (14) lines.
- (b) One (1) solvent distillation unit, Model LS-55IID to recover isopropyl alcohol (IPA)/solvents for reuse. This unit is capable of recovering 55 gallons per 8-hour shift.
- (c) Single-head recharge gassers used to add propellant to lightweight cans.
- (d) Soil and groundwater remediation systems consisting of soil vapor extraction and air sparging equipment installed for temporary operation under a Remediation Work Plan approved by the IDEM Voluntary Remediation Program.
- (e) Storage equipment and activities including pressurized storage tanks and associated piping for liquid petroleum gas (LPG); liquid natural gas (LNG) (propane);
- (f) Twenty-two (22) pressurized tanks,
- (g) Ink jet printers for small product code and box code printing;
- (h) Natural gas-fired combustion sources with heat input equal to or less than ten million (10,000,000) Btu per hour.
- (i) The source's two (2) natural gas-fired boilers, identified as boilers #1 and #2, each with a heat input capacity of 8.37 mmBtu/hr, and one (1) natural gas-fired boiler #3, with a heat input capacity of 6.28 mmBtu/hr. One (1) natural gas-fired water heater, with heat capacity of 1.5 mmBtu/hr, and two (2) natural gas-fired boilers, one boiler is rated at 1.05 mmBtu/hr and the other is rated at 2.65 mmBtu/hr.

- (j) Combustion source flame safety purging on startup;
- (k) Storage tanks with capacity less than or equal to 1,000 gallons and annual throughputs less than 12,000 gallons;
- (l) Vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids;
- (m) Packaging lubricants and greases;
- (n) Filling drums, pails or other packaging containers with lubricating oils, waxes and greases
- (o) Degreasing operations do not exceed 145 gallons per 12 months not subject to 326 IAC 20-6;
- (p) Cleaners and solvents characterized as follows:
 - (1) Having a vapor pressure equal to or less than 2 kPa; 15mm Hg; or 0.3 psr measured at 38 degrees C (100F) or;
 - (2) Having a vapor pressure equal to or less than 0.7 kPa; 5mm Hg; or 0.1 psi measured at 200C (680F); the use of which for all cleaners and solvents combined does not exceed 145 gallons per 12 months;
- (q) The following equipment related to manufacturing activities not resulting in the emissions of HAPs: brazing equipment, cuttinf torches, soldering equipment, welding equipment;
- (r) Closed loop heating and cooling systems;
- (s) Solvent recycling systems with batch capacity less than or equal to 100 gallons;
- (t) Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to 1% by volume;
- (u) Any operation using aqueous solutions containing less than 1% by weight of VOCs excluding HAPs;
- (v) Water based adhesives that are less than or equal to 5% by volume of VOCs excluding HAPs;
- (w) Replacement or repair of eletrostatic precipitators, bags in baghouses and filters in other air filtration equipment;
- (x) Heat exchanger cleaning and repair;
- (y) Process vessels degassing and cleaning to prepare for internal repairs;
- (z) Stockpiled soils from soil remediation activities that are covered and waiting transport for disposal;

- (aa) Paved and unpaved roads and parking lots with public access;
- (bb) Purging of gas lines and vessels that is related to routine maintenance and repair of buildings, structures, or vehicles at the sources where air emissions from those activities would not be associated with any production process;
- (cc) 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;
- (dd) Blowdown for any of the following: sight glass; boiler; compressors; pumps and cooling tower;
- (ee) Diesel generators not exceeding 1600 horsepower;
- (ff) Stationary fire pumps;
- (gg) Purge double block and bleed valves;
- (hh) Filter or coalescer media changeout; and
- (ii) A laboratory as defined in 326 IAC 2-7-1(21)(D).

Source Definition

This aerosol can filling company consists of two (2) plants:

- (1) Plant 1, comprised of Accra Pac, Inc., which is located at 2730 Middlebury Street, Elkhart, Indiana, and Accra Pac North which is located at 711 Middleton Run Road; Elkhart, Indiana; and
- (2) Plant 2, comprised of Health Care Industries is located at 2825 Middlebury Street, Elkhart, Indiana.

Since the two (2) plants are located on contiguous properties, have the same SIC codes and are owned by one company, they will be considered as one (1) source.

The two (2) sources are involved in the packaging of aerosol and non-aerosol products. Raw materials used include VOC and non-VOC liquids, VOC and non-VOC propellants, and a small amount of powders.

Because of the determination that these two sources are considered one source, Accra Pac and Health Care Industries, Inc. issued permits are being consolidated into one permit. The source is being re-permitted as PSD and the previous total VOC emissions of 406.7 tons per year (due to the

following issued permits) are superseded by this PSD permit:

- (a) CP039-4515 - issued on September 22, 1995
- (b) CP039-4129 - issued on March 27, 1995
- (c) CP039-3681 - issued on November 17, 1994
- (d) CP039-3682 - issued on August 11, 1994
- (e) CP039-3791 - issued on July 26, 1994
- (f) CP039-3345 - issued on April 15, 1994
- (g) CP039-3350 - issued on April 7, 1994, and
- (h) CP039-2249 - issued on January 22, 1992

For permit tracking purposes, Accra Pac Group, Inc. (for the whole source) will maintain the plant ID 039-00434.

Stack Summary

Stack ID	Operation	Height (feet)	Diameter (Inches)	Flow Rate (acfm)	Temperature (°F)
1	HCI Boiler #1	20	10	760	150
2	HCI Boiler #2	20	10	380	150
5	Accra Pac Boiler #1	30	14	2,270	200
6	Accra Pac Boiler #2	30	14	3,024	200
7	Line #1 and #2 Gashouse Exhaust Propellant Filling Line	27	41	9,170	82
8	Line #1 Filler Room	10	16 X16	3,560	80
12	Line #1 East Compounding	26	10 X 15	2,080	79
13	Line #1 West Compounding	26	10 X 15	2,080	79
16	#3 Exhaust Liquid Product Filling Room	31.7	26	3,000	80
17	Line #4 Filler Room	10.17	12 X 12	3,560	78
18	Line #4 Production	10.17	12 X 12	3,560	78
20	Line #4 Gashouse Exhaust propellant Filling Line	35	41	9,628	86
22	Line #4 Compounding	27	24	4,396	78

24	Line #4 Pre-weigh Room	23	12 X 12	1,500	76
31	Can Crusher	20	1.3'	2,732	80
32	Line #61 Liquid Product Filling Room	17	22	1,872	75
35	Line #61 Liquid Product Filling Room	9	18	4,136	74
36	Propellant Filling Line #61 Gashouse high speed	26.5	30	16,800	76
37	Propellant Filling Line #61 Gashouse low speed	26.5	30	5,600	76
39 3 vents	Line #63 High Speed Compounding	15.5	11	5,600	75
		15.5	18	5,600	75
		15.5	18	5,600	75
40	North Boiler	23	17	3,020	200
43	HCl Compounding North	19	27	1,592	90
44	HCl Compounding South	21.75	35.5	4,356	86
46	HCl Line #50 Mixing and Filling	15.17	18 x 18	2,200	80
47	Line #63 Filler	12	22	2,400	70
49	Line #63 Pump House	37	30	5,290	70
50	Line #63 Gashouse High Speed	37	30	21,000	76
51	Line #63 Gashouse Low Speed	37	30	8,875	76
52	Line #62	20	30	6,300	76
54	Line 55 Filling Room	30	12	1,000	79
56	Can Crushing Operation	19.42	12	2,273	79
61	Line 52 Filling Room	21.92	18	1,828	70
63	Propellant Filling Line 1	27	41	4,800	80
66	Liquid Mixing Line 4	27	46	4,396	78

Recommendation

The staff recommends to the Commissioner that the construction and operation be approved. This recommendation is based on the following facts and conditions:

Information, unless otherwise stated, used in this review was derived from the application and additional information submitted by the applicant.

An application for the purposes of this review was received on September 11, 1996, with series of

additional information received on January 28, 1997, March 10, 1997, July 17, 1997, August 19, 22, 1997, October 1, 1997, and January 7, 1998.

Emissions Calculations

(a) Can Crushing Emissions:

$$\begin{aligned}\text{VOC} &= 24,763,600 \text{ can/yr} * 0.011 \text{ lb VOC/can} * \text{ton}/2000 \text{ lb} \\ &= 136 \text{ ton/year}\end{aligned}$$

(b) Aerosol Can Filling Emissions:

The following emission factors for propellant filling (PF) and liquid filling (closed and open bowl) were based from the source's emission factors used in the issued construction permit which were modified based on the actual VOC content of the VOL compound.

- (1) Propellant Filling - 0.0013 lbVOC/can
The maximum source-wide throughput for propellant filling is 420,000,000 can/hour.

Propellant Filling			
Facility/Operation	Throughput (can/hr)	Emission Factor, Ef (lb/can)	VOC Emissions (tons/yr)
Accra Pac, Inc.			
Line 1	5,460	0.0013	31.0
Line 2	7,280	0.0013	41.4
Line 3	5,460	0.0013	31.0
Line 4	13,104	0.0013	74.6
Line 61	6,500	0.0013	37.0
Line 63	6,500	0.0013	37.0
Health Care Industries, Inc.			
Line 50	3,640	0.0013	20.7
TOTAL	47,944	0.0013	273

Methodology:

VOC Emissions = Throughput, can/hr * Ef, lb/can * ton/2000 lb * 8760hr/yr

- (2) Compounding and Liquid Filling (closed and open bowl) = 0.03 lb VOC/gal VOC
The maximum source-wide rate for compounding and filling VOC-containing liquid is 674,915,000 pounds per year. Assuming that all VOC-containing materials are mixed/compounded (even though some are pre-mixed and using an average density of 8.0 lbs/gallon.

Compounding and Liquid Filling			
Facility/Operation	Maximum Amount of VOC Material Compounded (MMlb/yr)	Emission Factor, Ef (0.03 lb VOC/gal VOC	VOC Emissions (tons/yr)
Accra Pac, Inc.			
Line 1	70	0.03	131.25
Line 2	89	0.03	166.8
Line 3	66	0.03	123.75
Line 4	160	0.03	300.0
Line 61	80	0.03	150
Health Care Industries, inc.			
Line 50	45	0.03	84.3
Line 51	21	0.03	39.4
Line 52	6	0.03	11.25
Line 53	48	0.03	90.0
Line 54	6	0.03	11.25
Line 55	40	0.03	75.0
Line 56	22	0.03	41.25
Line 57	22	0.03	41.25
TOTAL	675.0	0.03	1,265.5

Methodology:

VOC Emissions = Throughput, MMlb/yr * density, 1/8 lb/gal * % VOC * Ef, lb/gal * ton/2000 lb

- (3) 22 Storage Tanks VOC Emissions: (see Tanks 3.0 Program pages 1 through 5).

Total maximum throughput that the 22 storage tanks will store - 5,432,502 gallons. For emission calculation purposes this total maximum throughput will be assumed to be stored in one (1) storage tank, which represents emissions from all the storage tanks.

Density of VOL = 8.0 lb/gal

Total VOC Emissions from 22 Tanks = 2.9 tons/year

(4) Fugitive Leaks From Pumps, Valves and Fittings:

Facility	No. of Points	Ef (ton/year)	VOC Emissions (ton/year)
Propellant System Flanges	200	0.01767	3.5
Propellant System Pumps	30	0.19216	5.76
Propellant System Valves	90	0.05765	5.2
VOC-Containing Liquid Flanges	375	0.01767	6.6
VOC-Containing Liquid Pumps	50	0.19216	9.61
VOC-Containing Liquid Valves	200	0.03891	7.78
TOTAL			38.4

(5) Natural Gas Combustion Emissions: See page 1 of 1 TSD Appendix A.

SUMMARY OF EMISSIONS (TONS/YEAR)

Facility	POLLUTANT							
	PM	PM10	VOC	NOx	SO2	CO	Single HAP	Combined HAPs
Boilers	1.5	1.5	0.7	12.4	0.1	2.6	0.0	0.0
Can Crushing	0.0	0.0	136	0.0	0.0	0.0	161.2	705
Propellant Filling	0.0	0.0	273	0.0	0.0	0.0		
Compounding and liquid Filling	0.0	0.0	1,265.5	0.0	0.0	0.0		
Storage Tanks	0.0	0.0	2.9	0.0	0.0	0.0		
Fugitive Leaks From Pumps, Valves and Fittings	0.0	0.0	38.4	0.0	0.0	0.0		
TOTAL	1.5	1.5	1,716.7	12.4	0.1	2.6	161.2	705

Potential to Emit

Pursuant to 326 IAC 2-1.1-1(16), Potential to Emit is defined as “the maximum capacity of a stationary source 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.”

Pollutant	Potential to Emit (tons/year)
Particulate Matter (PM)	1.5
Particulate Matter (PM10)	1.5
Sulfur Dioxide (SO ₂)	0.1
Volatile Organic Compounds (VOC)	1,716.7
Carbon Monoxide (CO)	2.6
Nitrogen Oxides (NO _x)	12.4
Single Hazardous Air Pollutant (HAP)	161.2
Combination of HAPs	705

See emission calculations on pages 7 through 10 of this TSD.

- (a) The potential to emit (as defined in 326 IAC 2-1.1-1(16)) of volatile organic compounds (VOC) are greater than 100 tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-7;
- (b) The potential to emit (as defined in 326 IAC 2-1.1-1(16)) of any single HAP is greater than ten (10) tons per year and the potential to emit (as defined in 326 IAC 2-7-1(29)) of a combination HAPs is greater twenty-five (25) tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-7; and
- (c) Fugitive Emissions
Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2 and since there are no applicable New Source Performance Standards that were in effect on August 7, 1980, the fugitive particulate matter (PM) and volatile organic compound (VOC) emissions are not counted toward determination of PSD and Emission Offset applicability, but are counted towards PTE before control.

Actual Emissions

The following table shows the actual emissions from the source. This information reflects the 1995 Emission Inventory Report, and some production lines were not in operation.

Pollutant	Actual Emissions (tons/year)
Particulate Matter (PM)	1.7
Particulate Matter (PM10)	1.7
Sulfur Dioxide (SO ₂)	0.1
Volatile Organic Compounds (VOC)	195
Carbon Monoxide (CO)	2.6
Nitrogen Oxides (NO _x)	12.4

County Attainment Status

- (a) Volatile organic compounds (VOC) and oxides of nitrogen (NO_x) are precursors for the formation of ozone. Therefore, VOC and NO_x emissions are considered when evaluating the rule applicability relating to the ozone standards. Elkhart County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NO_x emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2 and 40 CFR 52.21.
- (b) Elkhart County has been classified as attainment or unclassifiable for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2 and 40 CFR 52.21.

Source Status

The table below summarizes the total potential to emit, reflecting all limits, of the significant emission units.

	Limited Potential to Emit (tons/year)
--	--

Process/facility	PM	PM-10	SO ₂	VOC	CO	NO _x	Single HAP	Combined HAPs
5 Boilers, & 1 water heater	1.5	1.5	0.1	0.7	2.6	12.4	0.0	0.0
Aerosol can filling	0.0	0.0	0.0	444.0	0.0	0.0	41.7	182.0
Can crushing								
Total Emissions	1.5	1.5	0.1	444.7	2.6	12.4	41.7	182.0

Note: Since the VOC is limited to 444 ton/yr, the HAPs emissions are scaled down as follows:

$$\begin{aligned}\text{Single HAP} &= \frac{161.2 \text{ ton/yr (444 ton/yr)}}{1,716 \text{ ton/yr}} \\ &= 41.7 \text{ ton/yr}\end{aligned}$$

$$\begin{aligned}\text{Combined HAPs} &= \frac{705 \text{ ton/yr (444 ton/yr)}}{1,716 \text{ ton/yr}} \\ &= 182.0 \text{ ton/yr}\end{aligned}$$

- (a) The source is major because VOC is emitted at a rate of 250 tons per year or more. Therefore, pursuant to 326 IAC 2-2, and 40 CFR 52.21, the Prevention of Significant Deterioration (PSD) requirements do apply.

Federal Rule Applicability

- (a) New Source Performance Standards (NSPS):

- (1) 326 IAC 12 and 40 CFR Part 60.116-60.117 Subpart Kb (Standards of Performance for Volatile Organic Liquid (VOL) Storage Vessels) for which Construction, Reconstruction, or Modification commenced after July 23, 1984 applies to each storage vessel with a capacity greater than 40 m³ (10,567 gallons). The following five (5) storage tanks are subject to the "Monitoring of Operation" requirement of Part 60.116b(b):

A1 - 15,000 gallons
A6 - 15,000 gallons
A7 - 15,000 gallons
A12 - 15,000 gallons
A13 - 15,000 gallons

This rule requires the owner or operator of these storage vessels to keep readily accessible records showing their dimensions and an analysis showing their capacity for the life of the source. See enclosed copy of this rule.

- (2) 326 IAC 12 and 40 CFR Part 60.116-60.117 Subpart Kb (Standards of Performance for Volatile Organic Liquid (VOL) Storage Vessels) for which Construction, Reconstruction, or Modification commenced after July 23, 1984 applies to each storage vessel with a capacity greater than 40 m³ (10,567 gallons).- The following tanks are not subject to this NSPS, because they are pressurized tanks, which operates in excess of 204.9 kPa and without emissions to the atmosphere:

P1A	- 25,000 gallons	P20	- 18,000 gallons
P17	- 30,000 gallons	P21	- 12,000 gallons
P16	- 30,000 gallons	P22	- 100,000 gallons
P18	- 18,000 gallons	P23	- 12,500 gallons
P19	- 30,000 gallons		

- (b) National Emission Standards for Hazardous Air Pollutants (NESHAPs)
There are no NESHAPs (40 CFR, Part 63) applicable to this source.

State Rule Applicability

- (a) 326 IAC 2-6 (Emission Reporting)
This source is subject to 326 IAC 2-6 (Emission Reporting), because the source emits more than 10 tons/yr of VOC in Elkhart County. Pursuant to this rule, the owner/operator of this source must annually submit an emission statement of the source. The annual statement must be received by April 15 and must contain the minimum requirements as specified in 326 IAC 2-6-4.
- (b) 326 IAC 8-4-3 (Petroleum Liquid Storage Vessels)
Even though the source is located in Elkhart County, some of the storage tanks in the
- tank farms which may contain petroleum products will not be subject to this rule, because, none of the tanks are equal to or greater than 39,000 gallon capacity.
- (c) 326 IAC 8-1-6 (General Reduction Requirements)
- (1) This rule will apply to new facilities existing as of January 1, 1980, which have potential VOC emissions of 25 tons per year. Lines 3, 4, 61, 62, 50 through 58 which were constructed after January 1, 1980 are subject to this rule, because each line potential VOC emissions are greater than 25 tons per year. The PSD permit however, will relax all the individual limits that are in the existing construction permits. The PSD BACT determined in this permit will satisfy the requirements of 326 IAC 8-1-6.
- (2) The can crushing operation has potential VOC emissions of 136 tons per year.

However, the company requested a limit of 24 tons per year in this facility's VOC emissions. Therefore, 326 IAC 8-1-6 does not apply.

(d) 326 IAC 6-2 (Particulate Emissions Limitations for Sources of Indirect Heating)

Boiler ID	Capacity (million Btu/hr)	Date of Construction	Rule Applicability	PM Allowable Emissions (lb/mmBtu)
Boiler #1 of APG	8.37	1976	326 IAC 6-2-3	0.6
Boiler #2 of APG	6.28	1976	326 IAC 6-2-3	0.6
Boiler #1 of HCl	1.05	1982	326 IAC 6-2-3	0.6
Boiler #3 of HCl	1.5	1992	326 IAC 6-2-4	0.45
Boiler #2 of APG	8.37	1993	326 IAC 6-2-4	0.45
Boiler #2 of HCl	2.65	1994	326 IAC 6-2-4	0.45

- (1) 326 IAC 6-2-3: The first three (3) boilers in the above table, rated at 8.37 mmBtu/hr, 6.28 mmBtu/hr and 1.05 mmBtu/hr are subject to this rule, because they were constructed before September 21, 1983. This rule mandates a PM emissions limit using the following equation:

$$\begin{aligned}
 Pt &= \frac{C * a * h}{76.5 * Q^{0.75} * N^{0.25}} \\
 &= \frac{50 * 0.67 * 29.4}{76.5 * 15.7^{0.75} * 3^{0.25}} \\
 &= 1.2 \text{ lb/mmBtu}
 \end{aligned}$$

Pursuant to section (e) of this rule, for Q of 250 mmBtu/hr or less, which began operation after June 8, 1972, the PM emission limit shall in no case exceed 0.6 lb/mmBtu heat input.

Where:

C = Maximum ground level concentration with respect to distance from the point source at the "critical wind speed for level terrain. This shall equal to 50 µg.

Pt = Pounds of particulate matter emitted per million Btu per heat input (lb/mmBtu).

Q = Total source maximum operating capacity rating in mmBtu/hr heat input.
= 15.7 mmBtu/hr

N = Number of stacks in fuel burning operation.
= 3

a = Plume rise factor which is used to make allowance for less than theoretical plume rise. The value 0.67 shall be used for Q less than 1,000

mmBtu/hr.

pa = the actual controlled emission rate in lb/mmBtu using the emission factor or stack test data.

h = Stack height in feet. If a number of stacks of different heights exist, the average stack height to represent "N" stacks shall be calculated by weighing each stack height with its particulate matter emission rate as follows:

$$h = \frac{E (H * pa * Q) \text{ from 1 to N}}{E (pa * Q) \text{ from 1 to N}}$$

$$= \frac{(30 * 0.012 * 8.37) + (30 * 0.012 * 6.28) + (20 * 0.012 * 1.05)}{(0.012 * 8.37) + (0.012 * 6.28) + (0.012 * 1.05)}$$

$$= 29.4 \text{ feet}$$

Using natural gas for fuel:

12 lb/MMCF * MMCF/1000 mmBtu = 0.012 lb/mmBtu < 0.6 lb/mmBtu, therefore the three (3) boilers are in compliance with the rule.

- (2) 326 IAC 6-2-4: The last three (3) boilers in the above table, rated at 1.5 mmBtu/hr, 8.37 mmBtu/hr and 2.65 mmBtu/hr are subject to this rule, because they were constructed after September 21, 1983. This rule mandates a PM allowable PM emissions using the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

$$= \frac{1.09}{28.2^{0.26}}$$

$$= 0.45 \text{ lb/mmBtu}$$

Where:

Pt = pounds of particulate matter emitted per million Btu (lb/mmBtu) heat input.

Q = Total source maximum operating capacity
= Existing boilers heat input, 15.7 mmBtu/hr + boilers subject to this rule, 12.52 mmBtu/hr
= 28.2 mmBtu/hr

Using natural gas for fuel:

12 lb/MMCF * MMCF/1000 mmBtu = 0.012 lb/mmBtu < 0.45 lb/mmBtu, therefore the last three (3) boilers in the above table are in compliance with the rule.

- (e) 326 IAC 6-3 (Allowable PM Emissions)
The powder can filling operation is subject to this rule which mandates a PM allowable emissions of 1.44 pounds per hour, using the following equation:

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

$$= 4.10 (0.21)^{0.67}$$

$$= 1.44 \text{ lb/hr}$$

$$= 6.3 \text{ ton/yr}$$

Where: E = PM allowable emissions in lb/hr
P = Process weight rate in tons/hr
= 0.21 ton/hr

This powder can filling operation is in compliance with this rule, since its potential PM emission of 0.014 lb/hr is less than allowable PM emissions of 1.44 lb/hr.

- (f) 326 IAC 2-1-3.4 (New Source Toxics Control Rule)
This rule is applicable to owner or operator who construct or reconstruct a major source of hazardous air pollutants (HAPs) after July 27, 1997.

The source is not subject to this rule, because it does not involve any new construction.

- (g) 326 IAC 2-2-3 - PSD rule: Best Available Control Technology (BACT) Requirements:
Subsection (a)(2) - A new, major stationary PSD shall apply best available control technology for each pollutant subject to the regulation under the provisions of the Clean Air Act for which said source has the potential to emit in significant amounts as defined in 326 IAC 2-2-1.

The proposed consolidation and relaxation of the existing permit limits issued to Accra Pac and Health Industries, Inc. will result in VOC emissions greater than the PSD threshold level of 250 tons per year. Therefore, a BACT analysis must be made for VOC.

BACT Analysis:

The BACT analysis for VOC submitted by Accra Pac, Inc. has been conducted in accordance with the "Top Down BACT Guidance" U.S. EPA, Office of Air Quality Planning and Standards, March 15, 1990.

- (1) First Evaluation:

The source analysis includes Control Technologies found in the U.S. EPA RACT/BACT/LAER Clearinghouse database. **A search of the three (3) databases covering different time periods and completeness resulted in no entrees of RACT, BACT or LAER determinations for facilities or processes in the aerosol can filling industry designated as Process Code 49.001.**

- (2) Second Evaluation:

The source conducted a telephone survey on similar sources to determine the types and level of control technologies currently in use. The following sources were contacted:

Table 1

Company	Address	Telephone	Contact	Operation	Emission Control	Permit Type
---------	---------	-----------	---------	-----------	------------------	-------------

Airosol, Inc.	11th and Illinois Neodesha, KS 30082	(800) 633-9576		aerosol filling	Under the Cup with vapor recovery	
Apollo Industries	1850 S. Cobb Industrial Blvd. Smyrna, GA 30082	(800) 533-3548	Dan Steeves x 217	aerosol filling	Under the Cup Filling	synthetic minor
Pharmasol Corporation minor source nonattainment area	1 Norfolk, Avenue South Easton, MA 02375	(508) 238-8501	Robert Barra, EH &S Mgr	aerosol filling operation. The application is still pending and being reviewed by the Massachussets Regulating Agency		
Rawn Company	P.O. Box 9 Spooner, WI 54801	(800) 826-6791	Roger Hansen	aerosol filling	Pressure Filling & Under the Cup Filling	none required
S.C. Johnson & Son	1525 Howe street Racine, WI 53403	(414) 260-3812	Ty Stockstale	aerosol filling	LAER was Pressure Filling	
United Coatings	2850 Festival Dr Kankakee, IL 60901	(815) 935-1200	Bruce Bouillette	Indiana plant: aerosol filling	Pressure Filling	Major Title V Source

The information in this table was verified by OAM.

- (3) **Raw Materials Substitution:**
Accra Pac is aggressively involved in the research and development of product reformulation that will minimize VOC emissions. Not only will environmental benefits be derived from such efforts, but since VOC losses also equates to valuable product losses, there are clear economic and business forces at work that drives these efforts. Also, while the range of VOC content in raw materials is limited by consumer specifications, regulations requiring further limitations and reductions in the VOC content of household consumer products are expected to be promulgated by the end of this year. Under the proposed National Volatile Organic Compound Emissions Standard for Consumer Products Rule (61 FR 14531, 4/2/96), manufacturers will be required to reduce the VOC content of many products (40 CFR Part 59).

- (4) **Add-On Control Options:**

The following add-on control devices were evaluated:

- (a) **Condensation - Condensation was determined to be technically infeasible** because they are only effective for gas streams containing high concentrations of high molecular weight VOCs. The minimum VOC concentration achievable at the outlet of a condensation system is the saturation concentration for that particular VOC. Water is the most common effective coolant. Therefore, even moderate VOC removal efficiencies of less than 50% are not achievable unless the vapors will condense at relatively high temperatures above 60 degrees F. The exhaust streams at Accra Pac Group, Inc. contain low concentration of low molecular weight VOCs. An example is butane and propane with boiling temperatures of 1 degree C and 42 degrees C respectively, therefore, **this is a technically infeasible option and was eliminated for further evaluation.**

- (b) **Carbon Adsorption** - carbon Adsorption was determined to be **technically infeasible** because this control method is effective for VOCs having molecular weights between approximately 60 and 180, this is because the molecules must be large enough to have sufficient Van der Waals forces, yet they cannot be too large, as larger molecules cannot be removed during the desorption cycle. Only about one-half the VOCs used by Accra Pac meet this criteria. Additionally, the presence of ketones at Accra Pac (or any VOC containing carbonyl group) can result in unacceptable exothermic reactions which could lead to carbon bed fires. In order for a solvent recovery system using this method to be cost effective, inlet concentration at Accra Pac would be on the order of 20 ppmv or less, excluding spikes. Therefore, this control **option was eliminated for further evaluation.**
- (c) **Liquid Absorption** - **Liquid absorption was determined to be technically infeasible** because these devices generally require that the gas constituent are soluble in an aqueous sorbate. At Accra Pac, approximately one half of the VOC are insoluble in water, such as propane and butane, therefore, gas absorption is not **a technically feasible control option and was eliminated for further evaluation.**
- (d) **Flares** - **Flares were determined to be technically infeasible** because the primary factors affecting flare control efficiency are the exhaust gas heating value, and flammability level, however the expected exhaust stream VOC concentration at Accra Pac, will be very low approximately 20 ppmv, **therefore flares are not technically feasible option and was eliminated for further evaluation.**
- (e) **Catalytic Oxidation** - **Catalytic oxidation was rejected as a control option because it was determined to be technically infeasible.** For this method of control to be effective the catalysts must be active and have sites available for VOCs to react. Build up of non-combustible particles, polymerized materials, or reaction of the catalyst with certain elements can "mask" or "poison" the catalyst, thus making it unavailable for initiating oxidation reactions. The variability and unpredictability of products filled at Accra Pac would make use of a catalyst ineffective. The low concentration of VOCs in the exhaust streams at Accra Pac would create a low temperature rise across the catalyst bed such that a poisoned or masked catalyst would likely go undetected. Therefore, catalytic oxidation is not a technically feasible control option and was **eliminated for further evaluation.**
- (f) **Thermal Oxidation** - **Thermal Oxidation was evaluated as a technically feasible option**, because of its reliability and effectiveness . The exhaust gases are preheated in an exchanger then directed to a high temperature combustion chamber. The low VOC concentrations present in the exhaust stream at Accra Pac will not provide any appreciable degree of self-sustained combustion. A supplemental fuel burner system would be necessary. Primary heat exchangers can be used to raise the inlet temperature of the exhaust stream, thus reducing the amount of supplemental fuel required. **Further analysis will be made on this control option.**

- The following is the cost analysis for the **two (2) technically feasible add-on control** devices namely: **recuperative and regenerative oxidizers**.

[illegible]

Recuperative Thermal Oxidizer No. 2	\$3,348,587	\$6,740,630	\$639,921	\$7,380,551	225.8	203	\$36,357	180.7
Health Care, Inc. Lines 50 through 54								
Option 1								
Regenerative Thermal Oxidizer No. 3	\$4,110,651	\$1,108,377	\$777,434	\$1,885,811	127.6	115	\$16,398	24.5
Option 2								
Recuperative Thermal Oxidizer No. 3	\$2,339,976	\$3,823,063	\$452,637	\$4,275,700	127.6	115	\$37,180	102.1
GM Lines 55 through 57								
Option 1								
Regenerative Thermal Oxidizer No. 4	\$2,244,800	\$524,253	\$430,972	\$955,225	59	53	\$18,023	11.3
Option 2								
Recuperative Thermal Oxidizer No. 4	\$1,422,967	\$1,780,766	\$282,361	\$2,063,127	59	53	\$38,926	47.1

Note: Each control option efficiency is 95%, system capture efficiency is 95%, with an overall efficiency of 90%.

The costs analysis from the BACT was based on the total air stream of 555,000 scfm or the requested VOC limit of 545 tons per year. The VOC emissions for each plant will be prorated based on each capacity.

Table 3

Location	Capacity (scfm)	Tons/yr VOC Emissions (ton/yr)
Accra Pac North Lines 61 through 63	135,000	133
Accra Pac Main Lines 1 through 4	230,000	225
Health care Lines 50 through 54	130,000	127
GM Lines 55 through 57	60,000	48
TOTAL	555,000	545

Methodology:

Total capital cost = equipment price + installation, ductwork cost + indirect cost
Total annual operating cost = direct operating cost + indirect operating cost
\$ per ton VOC removed = total annual operating cost / ton of VOC removed

The breakdown of the cost is as follows

- (1) Capital Cost
 - (a) Equipment Cost: Purchase price, sales tax and freight
 - (b) Direct cost: Foundation and support, installation, and ductwork, insulation, piping and painting
 - (c) Indirect cost: Engineering, construction and start-up, contractor's fee, performance testing, and contingencies
- (2) Annual Cost
 - (a) Direct annual cost: Utilities, operating labor, (operator, supervisor) maintenance (labor and materials)
 - (b) Indirect cost: Overhead, property tax, insurance, capital recovery

Second option, Accra pac Group also evaluated the installation of a control device for the entire source, although it was determined it would be impractical to install a large ductwork header across a major thoroughfare to collect the VOC emissions from the other buildings which would be required for the utilization of one control device for the entire source. From an operational standpoint, one control device for the entire source would be unacceptable, because it would have to shutdown the entire source when a single control device should malfunction or require preventive maintenance. The cost per ton of VOC removed for the configuration involving one control device for the entire source is as follows:

Control option	Building	Capacity	VOC Emissions (ton/yr)	VOC Removed	Annualized Cost	\$ Per Ton Removed	Energy Impact (mmBtu/hr)
Regenerative Thermal Oxidizer	Sourcewide	555,000	545	490.5	\$8,094,548	\$16,503	104.7
Recuperative Thermal Oxidizer	Sourcewide	555,000	545	490.5	\$18,236,452	\$37,179	436.0

Environmental Impact:

Accra Pac Lines 61 through 63					
Emission factor (lb/MMCF)	PM=PM10 13.7	SOx 0.6	NOx 140	VOC 2.8	CO 35
Option 1 Regenerative Thermal Oxidizer No. 1 (25.5 mmBtu/hr)	1.5 ton/yr	0.1 ton/yr	15.6 ton/yr	0.3 ton/yr	3.9 ton/yr
Emission factor (lb/MMCF)	PM=PM10 5.0	SOx 0.6	NOx 550	VOC 1.4	CO 40
Option 2 Recuperative Thermal Oxidizer No. 1 (106.1 mmBtu/hr)	2.3 ton/yr	0.3 ton/yr	255.6 ton/yr	0.7 ton/yr	18.6 ton/yr
Accra Pac Lines 1 through 4					

Emission factor (lb/MMCF)	PM=PM10 13.7	SOx 0.6	NOx 140	VOC 2.8	CO 35
Option 1 Regenerative Thermal Oxidizer No. 2 (43.4 mmBtu/hr)	2.6 ton/yr	0.1 ton/yr	26.6 ton/yr	0.5 ton/yr	6.7 ton/yr
Emission factor (lb/MMCF)	PM=PM10 5.0	SOx 0.6	NOx 550	VOC 1.4	CO 40
Option 1 Recuperative Thermal Oxidizer No. 2 (180.7 mmBtu/hr)	4.0 ton/yr	0.5 ton/yr	453.3 ton/yr	1.1 ton/yr	31.7 ton/yr
Health Care, Inc. Lines 50 through 54					
Emission factor (lb/MMCF)	PM=PM10 13.7	SOx 0.6	NOx 140	VOC 2.8	CO 35
Option 1 Regenerative Thermal Oxidizer No. 3 (25.5 mmBtu/hr)	1.5 ton/yr	0.1 ton/yr	15.6 ton/yr	0.3 ton/yr	3.9 ton/yr
Emission factor (lb/MMCF)	PM=PM10 5.0	SOx 0.6	NOx 550	VOC 1.4	CO 40.0
Option 2 Recuperative Thermal Oxidizer No. 3 (102.1 mmBtu/hr)	2.2 ton/yr	0.3 ton/yr	245.7 ton/yr	0.6 ton/yr	17.9 ton/yr
GM Lines 55 through 57					
Emission factor (lb/MMCF)	PM=PM10 13.7	SOx 0.6	NOx 140	VOC 2.8	CO 35
Option 1 Regenerative Thermal Oxidizer No. 4 (11.3 mmBtu/hr)	0.7 ton/yr	0.0 ton/yr	6.9 ton/yr	0.1 ton/yr	1.7 ton/yr
Option 2 Recuperative Thermal Oxidizer No. 4 (11.3 mmBtu/hr)	2.8 ton/yr	0.1 ton/yr	28.9 ton/yr	0.6 ton/yr	7.2 ton/yr
Sourcewide					
Emission factor (lb/MMCF)	PM=PM10 5.0	SOx 0.6	NOx 550	VOC 1.4	CO 40

Option 1 Regenerative Thermal Oxidizer (104.7 mmBtu/hr)	2.3 ton/yr	0.3 ton/yr	252.2 ton/yr	0.6 ton/yr	18.3 ton/yr
Option 1 Recuperative Thermal Oxidizer (436 mmBtu/hr)	9.5 ton/yr	1.1 ton/yr	1050 ton/yr	2.7 ton/yr	76.4 ton/yr

VOC BACT Conclusion:

There are no sources similar to the operations of Accra Pac Group, Inc. existing in the U.S. that have an add-on control. Table 2 and Table 4 indicate that putting an add-on control either on each of the four (4) buildings or one (1) for the entire source will not be cost effective to the company, and the environmental impact is significant.

VOC BACT Determination:

The BACT determined for the facilities at Accra Pac and Health Care Industries shall be as follows:

- (1) The pounds of VOC compounded and filled, including the propellant filled into containers per month; the number of cans filled with VOC per month; the number of can crushed that were filled with VOC; the cubic feet of natural gas used per month shall be limited such that the summation of the emissions calculated using the equation below shall not exceed a VOC emissions limit of 444 tons per twelve month period, rolled on a monthly basis.

$$\text{VOC Emission} = [(\text{lbs. VOC compounded \& filled/month}) \times (\text{Ef, 0.03 lbVOC/gal VOC}) + (\# \text{ cans filled with VOC/month}) \times (\text{Ef, 0.0013 lb VOC/can}) + (\# \text{ cans crushed filled with VOC}) \times (\text{Ef, 0.0111 lb VOC/can}) + (\text{cf natural gas used/month}) \times (\text{Ef, lb VOC/cf})]$$

- (2) Pressure filling or through-the-valve filling method shall be utilized at all times when the product being filled allows for this method.
 - (3) When pressure filling can not be utilized, Under the Cup fill method with vapor reclaim shall be utilized, or an equivalent means of reduction.
 - (5) Continue enclosure of open bowl liquid filling reservoirs, wherever possible.
 - (6) Utilized raw materials having the lowest feasible VOC content and vapor pressure, whenever possible.
 - (7) Continue movement toward consumer products that contain lower levels of VOCs and lower VOC composite partial vapor pressures.
- (h) 326 IAC 2-2-4, and 40 CFR 52.21 (Air Quality Analysis Requirements)
326 IAC 2-2-4(a) - PSD application shall contain an analysis of the ambient air quality in the area that the PSD source would affect.

Accra Pac Group, Inc. has submitted an air quality analysis of the area where the proposed modification to the contract filling operation is to be located (Elkhart, Elkhart County,

Indiana). this evaluation has been evaluated by the OAM. See appendix B (Air Quality Analysis) for details.

- (i) 326 IAC 2-2-5 and 40 CFR 52.21 (Air Quality Impacts Requirements)
326 IAC 2-2-5(c)(1) - Any estimates of ambient air concentrations shall be based upon applicable air quality models, data bases and other requirements specified by USEPA.

The analysis and results submitted by Accra Pac Group, Inc. were checked and verified by the OAM. See Appendix B (Air Quality Analysis) for details and conclusion.

- (j) 326 IAC 2-2-7, and 40 CFR 52.21 (Additional Analysis Requirements)
The results of the additional impact analysis conclude the operation of Accra Pac Group, Inc. contract package filling operation will have no significant impact on economic growth, soils, vegetation or visibility in the immediate vicinity or on any Class I area.
- (k) 326 IAC 2-2-8, and 40 CFR 52.21 (Source Obligation)
 - (1) Pursuant to 326 IAC 2-2-8(a)(1), the Commissioner may revoke this permit if construction is not commenced within eighteen (18) months after receipt of this approval; or if construction is discontinued for a period of eighteen (18) months or more; or if construction is not completed in a reasonable time.
 - (2) Pursuant to 326 IAC 2-2-8(a)(2) - Approval for construction shall not relieve GPC of the responsibility to comply fully with applicable provisions of the Indiana

State Implementation Plan and any other requirements under local, state, or federal law.

- (l) 326 IAC 2-2-10, and 40 CFR 52.21 (Source Obligation)
Accra Pac Group, Inc. has submitted the information necessary to perform analysis or make the determination required under PSD review.
- (m) 326 IAC 2-2-11 and 40 CFR 52.21 (Stack Height Provisions)
326 IAC 2-2-11(a)(1) - Applies to a source which commenced construction after December 31, 1970.
- (n) 326 IAC 2-2-12, and 40 CFR 52.21 (Permit Rescissions)
The construction permit shall remain in effect, unless it is rescinded, modified, revoked or expires.

Air Toxic Emissions

Indiana presently requests applicants to provide information on emissions of the 187 hazardous air pollutants set out in the Clean Air Act Amendments of 1990. These pollutants are either carcinogenic or otherwise considered toxic and are commonly used by industries. They are listed as air toxics on the Office of Air Management (OAM) Construction Permit Application Form Y.

- (a) This changes to the existing source will emit levels of air toxics greater than those that constitute major source applicability according to section 112 of the Clean Air Act. The concentrations of these air toxics were modeled and found to be (in worst case possible) as follows: The concentrations of these air toxics were compared to the Permissible Exposure Limits (PEL) developed by the Occupational Safety and Health Administration (OSHA). The Office of Air Management (OAM) does not have at this time any specific statutory or regulatory authority over these substances.

Air Toxic	Rate of Emissions		Modeled Concentration (Fg/m ³)	OSHA PEL (Fg/m ³)	% OSHA PEL
	(lb/hr)	(ton/y r)			
Benzene	0.07	0.3	7.09	3,200	2.22e-01
Chloroform	5.5	24.0	567.4	240,000	2.36e-01
Cresol	0.5	2.2	53.3	22,000	2.42e-01
Ethylene Glycol	3.0	13.1	311.8	125,000	2.49e-01
Ethylene Oxide	0.04	0.16	4.24	1,800	2.36e-01
Formaldehyde	0.02	0.08	2.12	930	2.28e-01
Hexane	17.4	76.2	2,836.5	1,800,000	1.58e-01
Hydrochloric Acid	0.168	0.73	17.8	7,000	2.54e-01
Hydroquinone	0.048	0.21	5.0	2,000	2.5e-01
Methanol	27.4	120.0	2,836.5	260,000	1.09e+00
Methyl Chloroform	13.68	59.9	1,418	1,900,000	7.46e-02
MEK	13.68	59.9	1,418	590,000	2.4e-01
MIK	9.54	41.8	992.7	410,000	2.4e-01
Methylene Chloride	4.1	17.9	425.3	174,000	2.44e-01
Nitrobenzene	0.123	0.5	12.8	5,000	2.56e-01
Phenol	0.463	2.0	48.4	19,000	2.55e-01

Propoxur	0.0126	0.055	1.3	500	2.6e-01
Styrene	10.3	45.1	1,065.7	428,000	2.49e-01
Toluene	17.8	77.96	1,845	752,000	2.45e-01
Vinyl Chloride	0.054	0.23	5.7	2,600	2.19e-01
Xylenes	10.3	45.1	1,065	435,000	2.45e-01
Glycol Ethers	27.0	118.3	2,836.5	-	-
TOTAL	161.2	705			

Conclusion

The consolidation of the two (2) plants' permits and the relaxation of the existing permit limits into a PSD source will be subject to the conditions of the attached proposed **PSD Permit and Part 70 Permit 039-6875-00434**.

**Appendix A: Emission Calculations
Natural Gas Combustion Only**

Page 1 of 1 TSD App A

1 @ 6.28 mmBtu/hr
2 @ 8.37 mmBtu/hr
1 @ 1.05 mmBtu/hr
1 @ 2.65 mmBtu/hr
1 @ 1.5 mmBtu/hr

**MM Btu/hr 0.3 - < 10
Commercial Boiler**

Company Name: Accra Pac Group, Inc.
Address City IN Zip: 2730 Middlebury : Street, Elkhart, IN 46515
PSD/Part 70 Permit: 039-6875-00434
Reviewer: Aida De Guzman
Date: 9/18/97

Heat Input Capacity
MMBtu/hr

Potential Throughput
MMCF/yr

28.2

247.2

Pollutant

Emission Factor in lb/MMCF	PM 12.0	PM10 12.0	SO2 0.6	NOx 100.0	VOC 5.3	CO 21.0
Potential Emission in tons/yr	1.5	1.5	0.1	12.4	0.7	2.6

Methodology

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Emission Factors for NOx: uncontrolled = 100, Low Nox Burner = 17, Flue gas recirculation = 36

Emission Factors for CO: uncontrolled = 21, Low NOx Burner = 27, Flue gas recirculation = ND

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,000 MMBtu

Emission Factors from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, and 1.4-3, SCC #1-03-006-03

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

TANKS PROGRAM 3.0
EMISSIONS REPORT - DETAIL FORMAT
TANK IDENTIFICATION AND PHYSICAL CHARACTERISTICS

PAGE 1
PSD/Part 70 Permit 039-6875-00434

Identification

Identification No.: 8
City: Elkhart
State: IN
Company: **Accra Pac Group**
Type of Tank: Horizontal Fixed Roof
Description: VOL Tank

Tank Dimensions

Shell Length (ft): 24.0
Diameter (ft): 8.0
Volume (gallons): 10000
Turnovers: 543.2
Net Throughput (gal/yr): 5,432,502

Paint Characteristics

Shell Color/Shade: White/White
Shell Condition: Good
Roof Color/Shade: White/White
Roof Condition: Good

Breather Vent Settings

Vacuum Setting (psig): 0.00
Pressure Setting (psig): 0.31

Meteorological Data Used in Emission Calculations: South Bend, Indiana (Avg Atmospheric Pressure = 14.7 psia)

TANKS PROGRAM 3.0
EMISSIONS REPORT - DETAIL FORMAT
LIQUID CONTENTS OF STORAGE TANK

PAGE 2
 PSD/Part 70 Permit 039-6875-00434

Mixture/Component	Liquid			Vapor			Liquid			Vapor			Basis for Vapor Pressure Calculations
	Daily	Liquid	Surf.	Bulk	Temp.	Vapor	Pressures	(psia)	Mol.	Mass	Mass	Mol.	
	Temperatures	(deg F)	Temp.										
	Month	Avg.	Min.	Max.	(deg F)	Avg.	Min.	Max.	Weight	Fract.	Fract.	Fract.	

Prestone Deicer	All	50.94	46.29	55.59	49.42	1.0757	0.9365	1.2319	37.990				37.990 Option 1: A=7.2100, B=1296.130, C=226.660

**TANKS PROGRAM 3.0
EMISSIONS REPORT - DETAIL FORMAT
DETAIL CALCULATIONS (AP-42)**

PAGE 3
PSD/Part 70 Permit 039-6875-00434

Annual Emission Calculations

Standing Losses (lb):	5.49
Vapor Space Volume (cu ft):	766.44
Vapor Density (lb/cu ft):	0.0096
Vapor Space Expansion Factor:	0.0300
Vented Vapor Saturation Factor:	0.929355

Tank Vapor Space Volume	
Vapor Space Volume (cu ft):	766.44
Tank Diameter (ft):	8.0
Effective Diameter (ft):	16.0
Vapor Space Outage (ft)	4.0
Tank Shell Height (ft):	24.0

Vapor Density	
Vapor Density (lb/cu ft):	0.0096
Vapor Molecular Weight (lb/lb-mole):	37.990000
Vapor Pressure at Daily Average Liquid Surface Temperature (psia):	1.3890
Daily Avg. Liquid Surface Temp.(deg. R):	510.61
Daily Average Ambient Temp. (deg. R):	509.07
Ideal Gas Constant R (psia cuft /(lb-mole-deg R)):	10.731
Liquid Bulk Temperature (deg. R):	509.09
Tank Paint Solar Absorptance (Shell):	0.17
Tank Paint Solar Absorptance (Roof):	0.17
Daily Total Solar Insolation Factor (Btu/sqft! day):	1131.25

**TANKS PROGRAM 3.0
EMISSIONS REPORT - DETAIL FORMAT
DETAIL CALCULATIONS (AP-42)**

PAGE 4

PSD/Part 70 Permit 039-6875-00434

Vapor Space Expansion Factor

Vapor Space Expansion Factor:	0.03000
Daily Vapor Temperature Range (deg.R):	18.59
Daily Vapor Pressure Range (psia):	0.222538
Breather Vent Press. Setting Range(psia):	0.31
Vapor Pressure at Daily Average Liquid Surface Temperature (psia):	1.3936
Vapor Pressure at Daily Minimum Liquid Surface Temperature (psia):	0.936502
Vapor Pressure at Daily Maximum Liquid Surface Temperature (psia):	1.5295
Daily Avg. Liquid Surface Temp. (deg R):	510.61
Daily Min. Liquid Surface Temp. (deg R):	505.96
Daily Max. Liquid Surface Temp. (deg R):	515.26
Daily Ambient Temp. Range (deg.R):	18.30

TANKS PROGRAM 3.0
EMISSIONS REPORT - DETAIL FORMAT
DETAIL CALCULATIONS (AP-42)
6875-00434

PAGE 5
PSD/Part 70 Permit 039-

Annual Emission Calculations

Vented Vapor Saturation Factor

Vented Vapor Saturation Factor: 0.77278

Vapor Pressure at Daily Average Liquid

Surface Temperature (psia): 1.075683

Vapor Space Outage (ft): 1.3893

Working Losses (lb): 472.417

Vapor Molecular Weight (lb/lb-mole): 37.9900

Vapor Pressure at Daily Average Liquid

Surface Temperature (psia): 1.075683

Annual Net Throughput (gal/yr): 5432508

Turnover Factor: 0.8294

Working Loss Product Factor: 1.00

Total Losses (lb): 5737.8

Total Losses (ton): 2.9

Air Quality Analysis

Introduction

Accra Pac Group, Inc. (Accra Pac) has applied for a Prevention of Significant Deterioration (PSD) permit to combine existing permits of its two packaging facilities in Elkhart, Elkhart County, Indiana. Accra Pac proposes to combine its permits from the facilities located at 2730 and 2825 Middlebury Street into one facility-wide permit with a relaxation of the VOC emission limitation. Accra Pac is located at Universal Transverse Mercator (UTM) coordinates 590130.0 East and 4614650.0 North. Elkhart County was redesignated from a nonattainment county to a maintenance county for ozone in November of 1994. All air quality modeling and analysis treat the VOC relaxation for Accra Pac as a major modification.

The purpose of the air quality impact analysis portion of the permit application is to accomplish the following objectives:

- A. Establish which pollutants require an air quality analysis.
- B. Determine the significant ambient air impact area from the source.
- C. Demonstrate the source will not cause or significantly contribute to a violation of the National Ambient Air Quality Standard (NAAQS).
- D. Perform analysis of any air toxic compound for health risk factor on general population.
- E. Perform a qualitative analysis of the source's impact on general growth, soils, vegetation and visibility in the impact area with emphasis on any Class I areas. The nearest Class I area is Kentucky's Mammoth Cave National Park is 500 kilometers to the south.

Air Solutions, Inc. prepared the PSD permit application for Accra Pac. The application was received by the Office of Air Management (OAM) on September 11, 1996 with series of additional information received on January 28, 1997, March 10, 1997, July 17, 1997, August 19, 22, 1997, October 1, 1997 and January 7, 1998. This document provides the Air Quality Modeling Section's review of the PSD permit application including an air quality analysis performed by the OAM.

Executive Summary

Accra Pac has applied for PSD construction permit for a VOC limit relaxation for its packaging facility in Elkhart, Indiana. The PSD application was prepared by Air Solutions, Inc. of Oakbrook, Illinois. Results taken from the Reactive Plume Model-IV (RPM-IV) indicated overall ozone impacts showed Accra Pac had no significant impact when the maximum concentration for ozone was reached. A hazardous Air Pollutants (HAPs) analysis was conducted using the Industrial Source Complex Short Term Model (ISCST3). Methanol was the only HAP found to be above the 0.5% of its Permissible Exposure Limits (PEL). There will be no significant impact from the modification on the nearest Class I area, which is the Kentucky's Mammoth Cave National Park. Additional impact analysis showed no impact on economic growth, soils, vegetation, or visibility in the areas surrounding the facility.

Part A

Pollutants Analyzed for Air Quality Impact

IAC 2-2 PSD requirements apply in attainment and unclassifiable area and require an air quality impact analysis of each regulated pollutant emitted in significant amount by a major stationary source or modification. Significant emission levels for each pollutant are defined in 326 IAC 2-2-1. Volatile Organic Compounds (VOCs) emissions of 569 tons per year are greater than the significant emission limit of 250 tons/year for VOCs.

Background Concentrations

In order to model the ozone impact from Accra Pac to compare to the NAAQS, a maximum ozone background concentration was needed for RPM-IV input. A monitor in the redesignated area was chosen as a worst-case scenario. The ozone monitor at the Water Treatment Plant in Elkhart County was selected with a maximum ozone background concentration over the last three years of 119 ppb, recorded on May 22, 1994. The modeling runs were conducted using both this background data and the second highest ozone background concentration over the three-year period of 115 ppb, recorded on June 18, 1995.

Part B

RPM-IV Inputs for Ambient and Plume-injected VOC Modes for NAAQS Analysis

Office of Air Management modeling utilized RPM-IV in order to predict ozone impacts from the facility. RPM-IV is a photochemical plume-segment model that simulates a photochemical plume by representing the plume as a series of cells across the horizon of the plume. RPM-IV consists of a Lagrangian model that follows a parcel of air pollutants as it travels downwind from a point source. Simulation of ambient air and resulting chemical transformations in a plume occur within the model to best represent actual conditions in the atmosphere.

The RPM-IV model was run in two modes; the first mode determined ambient conditions when high ozone concentrations were recorded. The second mode injects the VOC plume from the source into the ambient mode. The concentration from the second mode is subtracted from the first mode at downwind distances specified by certain time intervals and the difference between the two modes is the impact from Accra Pac. Source impact less than 3 ppb is not considered significant and not subject to further analysis. There are five main sections which make up RPM-IV input file. Short description of each;

- (1) INPUT - Defines plume type, duration, location, output interval, definition and flow variables.
- (2) CHEMIN - Define chemical mechanisms: RPM-IV reaction species and product species are define as well as reaction rates and temperatures.
- (3) SORCES - Data for emission injection (stack parameters and emissions).
- (4) METIN - Meteorological and ambient species concentrations, plume expansion rates and photolysis reaction rates.
- (5) RESULT - Parameters which control the display of RPM-IV simulation.

Inputs for each section are explained in detail in the PSD application. Initial conditions were obtained from the Lake Michigan Air Directors Consortium (LADCO). The OAM approves of the initial conditions which will most represent an ozone episode. Complete species information was recorded by LADCO aircraft for June 26, 1991, in which an ozone episode occurred in northern Indiana. This information was used to establish ambient boundary conditions to input into the RPM-IV model and is listed below in Table 1. Meteorological conditions were taken from the South Bend, Indiana National Weather Service Station with upper air data from the Peoria, Illinois Airport for June 26, 1991. The highest ozone data for the area over the latest three year period was 119 ppb, recorded on May 22, 1994 at the Water Treatment Plant monitor in Elkhart County. A second day was also chosen which had a maximum concentration of 115 ppb, recorded on June 18, 1995 at the same monitor.

TABLE 1			
Ambient Species Initial Concentration for 119 ppb background (ppb)			
CHEMICAL SPECIES	INITIAL CONCENTRATION	CHEMICAL SPECIES	INITIAL CONCENTRATION
Nitrogen Oxide (NOx)	5.0	Toluene (TOL)	0.335
Nitric Oxide (NO)	0.1	Xylene (XYL)	0.104
Ozone (O3)	66	(H2O2)	0.01
Carbon Monoxide (CO)	200	(HNO2)	0.01
Peroxy Acetyl Nitrate (PAN)	5.0	(PNA)	0.01
Olefins (OLE)	0.245	(HNO3)	10.0
Paraffins (PAR)	9.635	(CRES)	0.01
Ethene (ETH)	0.133	(OPEN)	0.01
Aldehyde (ALD2)	1.152	(MGLY)	0.01
Formaldehyde (FORM)	3.8	(H2O)	16E+6

The source-injected mode models the ambient conditions as well as the point source from which the VOCs are emitted. Complete stack information as well as each species's emission rate must be input into the model. A representative stack that all VOC emissions would be modeled would be required. The representative stack determination is based on calculation of the M value. The formula for which the M value is calculated is as follows:

$$M = (hs * V * Ts) / Q$$

where:

M = merged stack parameter
 hs = stack height (m)
 $V = (\pi/4)ds^2 * vs$ = stack gas volumetric flow rate (m³/sec)
 ds = inside stack diameter (m)
 Vs = stack gas exit velocity (m/sec)
 Ts = stack gas exit temperature
 Q = Pollutant emission rate (g/sec)

This procedure is described in Screening procedures for Estimating the Air Quality Impact of Stationary Sources, Revised, (EPA-454/R-92-019). The stack with the lowest M value and therefore the worst dispersion scenario is stack 54 of the Liquid Product Filling Room of Accra pac. Results of this procedure are shown in Addendum at the end of this document.

It is necessary to disaggregate or split VOC emissions for input into the SORCES section when Carbon Bond Mechanism IV (CBM-IV) is used. EPA has supplied information from Urban Airshed Model (UAM) studies which list chemicals and their respective CBM-IV classes. VOC emissions taken from Accra

Pac's 1995 inventory, were speciated by percentage of chemicals used. VOC species' emissions were then disaggregated into CBM-IV classes. The CBM-IV class emission results are listed below in Table 2.

TABLE 2 -CBM-IV Species Emissions (g/sec)				
CHEMICAL	PAR	XYL	MEOH	ETOH
Xylene		1.32e+0		
Propane	9.42e-1			
Butane	4.86e-1			
Isobutane	4.78e+0			
Heptane	1.15e+1			
Methyl Alcohol			2.27e+0	
Methyl ethyl ketone	9.29e-2			
Ethyl alcohol				1.34e+0
Isopropyl alcohol	5.28e-1			
Diacetone alcohol	5.72e-2			
Propylene glycol	5.14e-2			
Dimethyl ether	1.00e-2			
2-Butoxyethanol	1.00e-2			
Ethylene glycol	5.88e-2			
Ethylene oxide	3.44e-3			
TOTAL	8.17e+00	1.32e+00	2.27e+00	1.34e+00

NAAQS modeling for 1 hour ozone concentrations was conducted to compare the results to the ozone NAAQS limit of 120.0 ppb. The maximum cell concentration for each time and distance specified was used to compare to the ambient mode. Modeling results are shown in Table 3 for the 119 ppb background and for the background of 115 ppb. Table 3 shows each hour and the distance the plume travels for the source followed by the results of the ambient and source-injected modes for the 119 ppb and 115 ppb ozone backgrounds. The table is set up to compare the impacts from Accra Pac for different background scenarios. Times and distances for each background will be the same since the same meteorological data was used. This meteorological data is the most representative and comprehensive data available to IDEM-OAM at this time and correlates with ambient boundary condition collected from LADCO aircraft.

TABLE 3 - NAAQS Analysis for Ozone							
		119 ppb Background			115 ppb Background		
Time	Distance	Ambient	Source Injected	Source Impact	Ambient	Source Injected	Source Injected
(hours)	(meters)	(ppb)	(ppb)	(ppb)	(ppb)	(ppb)	(ppb)
700.0	100.0	66.0	66.0	0	60.0	60.0	0.0
800.0	10500.0	76.3	77.1	0.8	70.7	71.5	0.8
900.0	25800.0	87.8	88.8	0.4	82.7	83.0	0.3
1000.0	42000.0	99.4	99.5	0.1	94.4	94.8	0.4
1100.0	59700.0	109.0	108.0	-1.0	104.0	103.0	-1.0
1200.0	78900.0	113.0	113.0	0	109.0	109.0	0
1300.0	99200.0	117.0	116.0	-1.0	113.0	111.0	-2.0
1400.0	118000.0	118.0	116.0	-2.0	114.0	112.0	-2.0
1500.0	139000.0	119.0	117.0	-2.0	115.0	113.0	-2.0
1600.0	160000.0	119.0	117.0	-2.0	115	113.0	-2.0
1700.0	180000.0	119.0	117.0	-2.0	115	113.0	-2.0
1800.0	199000.0	119.0	117.0	-2.0	115	113.0	-2.0
1900.0	226000.0	119.0	117.0	-2.0	115	113.0	-2.0

The maximum impact (difference between the source-injected and ambient modes) from Accra Pac was 0.8 ppb. However, all ambient plus source-injected modes were below the NAAQS limit for ozone at every time period and every distance. Accra Pac's emissions became well entrained in the plume and mixing of the emissions limited Accra Pac's overall ozone impact. Since Accra Pac had no significant impact during the maximum concentration, further modeling for ozone impacts from Accra Pac is not required.

Part C

Hazardous Air Pollutant Analysis and Results

OAM presently requests data concerning the emission of 187 Hazardous Air Pollutants (HAPs) listed in the 1990 Clean Air Act Amendments which are either carcinogenic or otherwise considered toxic and may be used by industries in the State of Indiana. These substances are listed as air toxic compounds on the State of Indiana, Department of Environmental Management, Office of Air Management's construction permit application Form Y. Any one HAP over 10 tons /year or all HAPs with total emissions

over 25 tons/year will be subject to toxic modeling analysis for a modification. Total emission rates for each HAP are listed in Table 4 below. The HAPs emissions are above the de minimis emission rates of 10 tons/yr for one HAP and 25 tons/yr for all applicable HAPs, therefore, a modeling analysis for each HAP was conducted.

The Office of Air Management performed the HAP analysis using the Industrial Source Complex Short term (ISCST3) model, Version 3, dated 96113. This version utilizes the Schulman-Scire algorithm to account for the effects of building downwash. Stacks associated with the modification were below Good Engineering Practice (GEP) stack heights. Therefore, the aerodynamics downwash parameters were calculated using EPA's Building Profile Input program (BPIP).

The meteorological data used in the ISCST3 model consisted of surface data from the South Bend, Indiana National Weather Service station merged with the mixing heights from Peoria, Illinois Airport for 1991. The data was obtained from the EPA Support Center for Regulatory Air Model electronic Bulletin Board and processed by PCRAMMET. OAM modeling utilized receptor grids out 2 kilometers and discrete receptors were placed 50 meters apart on Accra Pac's property lines.

A maximum 8 hour off-property concentration was determined and this concentration was recorded as a percentage of each HAP's Permissible Exposure Limit (PEL). The PELs were established by the Occupational Safety and Health Administration (OSHA). Table 4 shows the result of the HAP analysis with each HAP's emission rate, PEL, modeled concentrations and the percentage of PEL. Methanol was the only HAP found to be above 0.5% of its Permissible Exposure Limits (PEL).

TABLE 4 - HAPs Modeling Results				
Pollutant	Emission rate (lb/hr)	PEL (ug/m ³)	Modeled Concentration (ug/m ³)	Percentage of PEL (%)
Benzene	0.114	3200.0	7.09	2.22e-01
Chloroform	9.132	240000.0	567.4	2.36e-01
Cresol	0.856	22000.0	53.3	2.42e-01
Ethylene glycol	5.023	125000.0	311.8	2.49e-01
Ethylene oxide	0.068	1800.0	4.24	2.36e-01
Formaldehyde	0.034	930.0	2.12	2.28e-01
Hexane	45.662	1800000.0	2836.5	1.58e-01
Hydrochloric acid	0.285	7000.0	17.7	2.54e-01
Hydroquinone	0.08	2000.0	5.0	2.50e-01
Methanol	45.662	260000.0	2836.5	1.09e-00
Methyl chloroform	22.831	1900000.0	1418.0	7.46e-02

MEK	22.831	590000.0	1418.0	2.40e-01
MIK	15.982	410000.0	992.7	2.42e-01
Methylene chloride	6.849	174000.0	425.3	2.44e-01
Nitrobenzene	0.205	5000.0	12.8	2.56e-01
Phenol	0.776	19000.0	48.4	2.55e-01
Propoxur	0.021	500.0	1.3	2.60e-01
Styrene	17.123	428000.0	1065.7	2.49e-01
Toluene	29.68	752000.0	1845.3	2.45e-01
Vinyl chloride	0.091	2600.0	5.7	2.19e-01
Xylenes	17.123	435000.0	1065.7	245e-01
Glycol ethers	45.662	-	2836.5	-

Part D

Additional Impact Analysis

The Accra Pac PSD permit application provided an additional impact analysis performed by Air Solutions, Inc.. This analysis included an impact on economic growth, soils vegetation, and visibility. Commercial growth, as a result of the modification is at expected since modification is only a relaxation of the VOC limit and minimal growth impacts are expected. There will be no adverse impact on air quality in the area due to industrial, residential or commercial growth. According to the modeled concentration significant when the NAAQS limit is approached. Additionally, the maximum modeled concentrations for ozone are below the threshold limits necessary to have adverse impacts on surrounding vegetation. The nearest Class I area is more than 100 kilometers from the facility and a Class I impact and visibility analysis is not required.