



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

Mitchell E. Daniels Jr.
Governor

Thomas W. Easterly
Commissioner

100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

TO: Interested Parties / Applicant

DATE: April 5, 2011

RE: Resco Products / 089 - 29427 - 00222

FROM: Matthew Stuckey, Branch Chief
Permits Branch
Office of Air Quality

Notice of Decision: Approval - Effective Immediately

Please be advised that on behalf of the Commissioner of the Department of Environmental Management, I have issued a decision regarding the enclosed matter. Pursuant to IC 13-15-5-3, this permit is effective immediately, unless a petition for stay of effectiveness is filed and granted according to IC 13-15-6-3, and may be revoked or modified in accordance with the provisions of IC 13-15-7-1.

If you wish to challenge this decision, IC 4-21.5-3 and IC 13-15-6-1 require that you file a petition for administrative review. This petition may include a request for stay of effectiveness and must be submitted to the Office of Environmental Adjudication, 100 North Senate Avenue, Government Center North, Suite N 501E, Indianapolis, IN 46204, **within eighteen (18) calendar days of the mailing of this notice**. The filing of a petition for administrative review is complete on the earliest of the following dates that apply to the filing:

- (1) the date the document is delivered to the Office of Environmental Adjudication (OEA);
- (2) the date of the postmark on the envelope containing the document, if the document is mailed to OEA by U.S. mail; or
- (3) The date on which the document is deposited with a private carrier, as shown by receipt issued by the carrier, if the document is sent to the OEA by private carrier.

The petition must include facts demonstrating that you are either the applicant, a person aggrieved or adversely affected by the decision or otherwise entitled to review by law. Please identify the permit, decision, or other order for which you seek review by permit number, name of the applicant, location, date of this notice and all of the following:

- (1) the name and address of the person making the request;
- (2) the interest of the person making the request;
- (3) identification of any persons represented by the person making the request;
- (4) the reasons, with particularity, for the request;
- (5) the issues, with particularity, proposed for considerations at any hearing; and
- (6) identification of the terms and conditions which, in the judgment of the person making the request, would be appropriate in the case in question to satisfy the requirements of the law governing documents of the type issued by the Commissioner.

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178. Callers from within Indiana may call toll-free at 1-800-451-6027, ext. 3-0178.

Enclosures
FNPER.dot12/03/07



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Federally Enforceable State Operating Permit Renewal OFFICE OF AIR QUALITY

**Resco Products, Inc.
5501 Kennedy Avenue
Hammond, Indiana 46323**

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

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

This permit is issued in accordance with 326 IAC 2 and 40 CFR Part 70 Appendix A and contains the conditions and provisions specified in 326 IAC 2-8 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.

Indiana statutes from IC 13 and rules from 326 IAC, quoted 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 FESOP under 326 IAC 2-8.

Operation Permit No.: F089-29427-00222	
Issued by:  Iryn Calilung, Section Chief Permits Branch Office of Air Quality	Issuance Date: April 5, 2011 Expiration Date: April 5, 2021

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SECTION A SOURCE SUMMARY

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

A.1 General Information [326 IAC 2-8-3(b)]

The Permittee owns and operates a stationary refractory products manufacturing facility.

Source Address:	5501 Kennedy Avenue, Hammond, Indiana 46323
General Source Phone Number:	(219) 844-7830
SIC Code:	3297
County Location:	Lake
Source Location Status:	Nonattainment for PM2.5 standard Attainment for all other criteria pollutants
Source Status:	Federally Enforceable State Operating Permit Program Minor Source, under PSD and Emission Offset Rules Minor Source, Section 112 of the Clean Air Act Not 1 of 28 Source Categories

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

This stationary source consists of the following emission units and pollution control devices:

Magnesite Processing

- (a) Magnesite Unloading and Crushing (D-1), identified as PD-1, constructed in 1971, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-1.
- (b) Magnesite Handling & Storage (D-2), identified as PD-2, constructed in 1993, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-2.
- (c) Magnesite Classifying & Milling - East (D-8), identified as PD-8, constructed in 1956, with a maximum rate of 25 tons per hour, using a baghouse as control, and exhausting to stack D-8.
- (d) Batts Crushing & Screening (D-9), identified as PD-9, constructed in 1956, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-9.
- (e) Material Screening & Milling – West (D-11), identified as PD-11, constructed in 1992, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-11.
- (f) Material Screening & Milling – West (D-13), identified as PD-13, constructed in 1956, with a maximum rate of 16 tons per hour, using a baghouse as control, and exhausting to stack D-13.

Mixing Department

- (g) DEV-22 Mixer (D-4), identified as PD-4, constructed in 1996, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-4.
- (h) RV-15 Mixers #1 and #2 (D-21), identified as PD-12B, constructed in 1984, and PD-12C, constructed in 1988, each with a maximum rate of 4.25 tons per hour, using separate baghouses as control, and exhausting to a common stack D-21.
- (i) RV-15 Mixer #3 (D-12D), identified as PD-12D, constructed in 1993, with a maximum rate of 4.25 tons per hour, using a baghouse as control, and exhausting to stack D-12D.
- (j) DE-18 Flat Mixer (D-14), identified as PD-14, constructed in 1993, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-14.

Pressing Department

- (k) Resin Bond Batch (D-12A), identified as PD-12A, constructed in 1996, with a maximum rate of 10.9 tons per hour, using a baghouse as control, and exhausting to stack D-12A.

Drying Department

- (l) Basic Dryer (S-8), identified as PS-8, constructed in 1957, with a maximum drying rate of 4.1 tons per hour and natural gas heat input rate of 13.5 million Btu/hr, exhausting to stack S-8.
- (m) Rotary Dryer (D-10), identified as PD-10, constructed in 1957, with a maximum drying rate of 20 tons per hour and natural gas heat input rate of 3.5 million Btu/hr, using a baghouse as control, and exhausting to stack D-10.

Batching Department

- (n) Material Receiving Vessel Vent (D-12E), identified as PD-12E, constructed in 1993, with a maximum rate of 18 tons per hour, using a baghouse as control, and exhausting to stack D-12E.
- (o) Graphite Transport (D-19), identified as PD-19, constructed in 1993, with a maximum rate of 6 tons per hour, using a baghouse as control, and exhausting to stack D-19.
- (p) Minor Additive Transport (D-20), identified as PD-20, constructed in 1993, with a maximum rate of 0.75 tons per hour, using a bin vent as control, and exhausting to stack D-20.
- (q) Batch Station Transport (D-22), identified as PD-22, constructed in 1996, with a maximum rate of 14 tons per hour, using a baghouse as control, and exhausting to stack D-22.

Montco Line

- (r) Montco Line (S-30), identified as PS-30, constructed in 2001, with a maximum rate of 10 tons per hour, using a jet pulse cartridge dust collector as control, and exhausting to stack S-30.

Kiln

- (s) One (1) natural gas-fired kiln, identified as the Bickley Periodic Elevator Kiln, installed in 2006, with a maximum unfired raw refractory rate of 3500 tons per year and a maximum heat input capacity of 21 MMBtu/hr, and exhausting to stack #2 TK.

Refractory Liquids System

- (t) One (1) Refractory Liquids system, identified as PS-31, approved for construction in 2011, and consisting of:
 - (1) One (1) 2,000 gallon closed blending tank, equipped with a bag filter for particulate control, and exhausting within the building.
 - (2) One (1) 6,000 gallon methanol storage tank.

A.3 Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]

This stationary source also includes the following insignificant activities:

- (a) Space heaters, process heaters, or boilers using natural gas-fired combustion sources with heat input equal to or less than ten million (10,000,000) Btu per hour.
- (b) Equipment powered by internal combustion engines of capacity equal to or less than 500,000 Btu/hour, except where total capacity of equipment operated by one stationary source exceeds 2,000,000 Btu/hour.
- (c) Combustion source flame safety purging on startup.
- (d) VOC and HAP vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids.
- (e) Refractory storage not requiring air pollution control equipment.
- (f) Machining where an aqueous cutting coolant continuously floods the machining interface.
- (g) Any operation using aqueous solutions containing less than 1% by weight of VOC excluding HAPs.
- (h) Replacement or repair of electrostatic precipitators, bags in baghouses and filters in other air filtration equipment.
- (i) Paved and unpaved roads and parking lots with public access.
- (j) Purging of gas lines and vessels that is related to routine maintenance and repair of buildings, structures, or vehicles from the source where air emissions from those activities would not be associated with any production process.
- (k) Blowdown for any of the following: sight glass; boiler; compressors; pumps; and cooling tower.
- (l) Emergency gasoline generators not exceeding 110 horsepower.
- (m) Stationary fire pumps.
- (n) Purge double block and bleed valves.

- (o) Mold release agents using low volatile products (vapor pressure less than or equal to 2 kilopascals measured at 38 degrees C).
- (p) A laboratory as defined in 326 IAC 2-7-1(21)(D).

A.4 FESOP Applicability [326 IAC 2-8-2]

This stationary source, otherwise required to have a Part 70 permit as described in 326 IAC 2-7-2(a), has applied to the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) to renew a Federally Enforceable State Operating Permit (FESOP).

SECTION B GENERAL CONDITIONS

B.1 Definitions [326 IAC 2-8-1]

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

B.2 Permit Term [326 IAC 2-8-4(2)][326 IAC 2-1.1-9.5][IC 13-15-3-6(a)]

- (a) This permit, F089-29427-00222, is issued for a fixed term of ten (10) years from the issuance date of this permit, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3. Subsequent revisions, modifications, or amendments of this permit do not affect the expiration date of this permit.
- (b) If IDEM, OAQ, upon receiving a timely and complete renewal permit application, fails to issue or deny the permit renewal prior to the expiration date of this permit, this existing permit shall not expire and all terms and conditions shall continue in effect, until the renewal permit has been issued or denied.

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

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

- (a) the condition is modified in a subsequent permit action pursuant to Title I of the Clean Air Act; or
- (b) the emission unit to which the condition pertains permanently ceases operation.

B.4 Enforceability [326 IAC 2-8-6] [IC 13-17-12]

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

B.5 Severability [326 IAC 2-8-4(4)]

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 2-8-4(5)(D)]

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

B.7 Duty to Provide Information [326 IAC 2-8-4(5)(E)]

- (a) The Permittee shall furnish to IDEM, OAQ, within a reasonable time, any information that IDEM, OAQ may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. Upon request, the Permittee shall also furnish to IDEM, OAQ copies of records required to be kept by this permit.
- (b) For information furnished by the Permittee to IDEM, OAQ, the Permittee may include a claim of confidentiality in accordance with 326 IAC 17.1. When furnishing copies of requested records directly to U. S. EPA, the Permittee may assert a claim of confidentiality in accordance with 40 CFR 2, Subpart B.

B.8 Certification [326 IAC 2-8-3(d)][326 IAC 2-8-4(3)(C)(i)][326 IAC 2-8-5(1)]

- (a) A certification required by this permit meets the requirements of 326 IAC 2-8-5(a)(1) if:

- (1) it contains a certification by an "authorized individual", as defined by 326 IAC 2-1.1-1(1), and
 - (2) the certification states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.
- (b) The Permittee may use the attached Certification Form, or its equivalent with each submittal requiring certification. One (1) certification may cover multiple forms in one (1) submittal.
 - (c) An "authorized individual" is defined at 326 IAC 2-1.1-1(1).

B.9 Annual Compliance Certification [326 IAC 2-8-5(a)(1)]

- (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. All certifications shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted no later than April 15 of each year to:

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

- (b) The annual compliance certification report required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) The annual compliance certification report shall include the following:
 - (1) The appropriate identification of each term or condition of this permit that is the basis of the certification;
 - (2) The compliance status;
 - (3) Whether compliance was continuous or intermittent;
 - (4) The methods used for determining the compliance status of the source, currently and over the reporting period consistent with 326 IAC 2-8-4(3); and
 - (5) Such other facts, as specified in Sections D of this permit, as IDEM, OAQ may require to determine the compliance status of the source.

The submittal by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

B.10 Compliance Order Issuance [326 IAC 2-8-5(b)]

IDEM, OAQ may issue a compliance order to this Permittee upon discovery that this permit is in nonconformance with an applicable requirement. The order may require immediate compliance or contain a schedule for expeditious compliance with the applicable requirement.

B.11 Preventive Maintenance Plan [326 IAC 1-6-3][326 IAC 2-8-4(9)][326 IAC 2-8-5(a)(1)]

- (a) A Preventive Maintenance Plan meets the requirements of 326 IAC 1-6-3 if it includes, at a minimum:
- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
 - (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
 - (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

The Permittee shall implement the PMPs.

- (b) If required by specific condition(s) in Section D of this permit where no PMP was previously required, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMPs) no later than ninety (90) days after issuance of this permit or ninety (90) days after initial start-up, whichever is later, 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; and
 - (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If, due to circumstances beyond the Permittee's control, the PMPs 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 and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The PMP extension notification does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

The Permittee shall implement the PMPs.

- (c) A copy of the PMPs shall be submitted to IDEM, OAQ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions. The PMPs and their submittal do not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (d) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

B.12 Emergency Provisions [326 IAC 2-8-12]

- (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 2-8-12.
- (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, OAQ, or Northwest Regional Office within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

Telephone Number: 1-800-451-6027 (ask for Office of Air Quality, Compliance and Enforcement Branch), or
Telephone Number: 317-233-0178 (ask for Office of Air Quality, Compliance and Enforcement Branch)
Facsimile Number: 317-233-6865
Northwest Regional Office phone: (219) 757-0265; fax: (219) 757-0267.

- (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 and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

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

The notice fulfills the requirement of 326 IAC 2-8-4(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 a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (6) The Permittee immediately took all reasonable steps to correct the emergency.
- (c) In any enforcement proceeding, the Permittee seeking to establish the occurrence of an emergency has the burden of proof.
- (d) This emergency provision supersedes 326 IAC 1-6 (Malfunctions). This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.
- (e) The Permittee seeking to establish the occurrence of an emergency shall make records available upon request to ensure that failure to implement a PMP did not cause or contribute to an exceedance of any limitations on emissions. However, IDEM, OAQ may require that the Preventive Maintenance Plans required under 326 IAC 2-8-3(c)(6) be revised in response to an emergency.
- (f) Failure to notify IDEM, OAQ by telephone or facsimile of an emergency lasting more than one (1) hour in accordance with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-8 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 material of substantial economic value.

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

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

- (a) All terms and conditions of permits established prior to F089-29427-00222 and issued pursuant to permitting programs approved into the state implementation plan have been either:
 - (1) incorporated as originally stated,
 - (2) revised, or
 - (3) deleted.
- (b) All previous registrations and permits are superseded by this permit.

B.14 Termination of Right to Operate [326 IAC 2-8-9][326 IAC 2-8-3(h)]

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 2-8-3(h) and 326 IAC 2-8-9.

B.15 Permit Modification, Reopening, Revocation and Reissuance, or Termination [326 IAC 2-8-4(5)(C)][326 IAC 2-8-7(a)][326 IAC 2-8-8]

- (a) This permit may be modified, reopened, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a Federally Enforceable State Operating 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 2-8-4(5)(C)] The notification by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (b) This permit shall be reopened and revised under any of the circumstances listed in IC 13-15-7-2 or if IDEM, OAQ determines any of the following:
- (1) That this permit contains a material mistake.
 - (2) That inaccurate statements were made in establishing the emissions standards or other terms or conditions.
 - (3) That this permit must be revised or revoked to assure compliance with an applicable requirement. [326 IAC 2-8-8(a)]
- (c) Proceedings by IDEM, OAQ to reopen and revise this permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. Such reopening and revision shall be made as expeditiously as practicable. [326 IAC 2-8-8(b)]
- (d) The reopening and revision of this permit, under 326 IAC 2-8-8(a), shall not be initiated before notice of such intent is provided to the Permittee by IDEM, OAQ at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ may provide a shorter time period in the case of an emergency. [326 IAC 2-8-8(c)]

B.16 Permit Renewal [326 IAC 2-8-3(h)]

- (a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAQ and shall include the information specified in 326 IAC 2-8-3. Such information shall be included in the application for each emission unit at this source, except those emission units included on the trivial or insignificant activities list contained in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(40). The renewal application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Request for renewal shall be submitted to:

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

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

- (1) Submitted at least nine (9) months prior to the date of the expiration of this permit; and
- (2) If the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) If the Permittee submits a timely and complete application for renewal of this permit, the source's failure to have a permit is not a violation of 326 IAC 2-8 until IDEM, OAQ takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified, pursuant to 326 IAC 2-8-3(g), in writing by IDEM, OAQ any additional information identified as being needed to process the application.

B.17 Permit Amendment or Revision [326 IAC 2-8-10][326 IAC 2-8-11.1]

- (a) Permit amendments and revisions are governed by the requirements of 326 IAC 2-8-10 or 326 IAC 2-8-11.1 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
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

Any such application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-8-10(b)(3)]

B.18 Operational Flexibility [326 IAC 2-8-15][326 IAC 2-8-11.1]

- (a) The Permittee may make any change or changes at the source that are described in 326 IAC 2-8-15(b) through (d) 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 2-8-11.1 has been obtained;
 - (3) The changes do not result in emissions which exceed the limitations provided in 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
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003

Indianapolis, Indiana 46204-2251

and

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

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

- (5) The Permittee maintains records on-site, on a rolling five (5) year basis, which document all such changes and emission trades that are subject to 326 IAC 2-8-15(b) through (d). The Permittee shall make such records available, upon reasonable request, for public review.

Such records shall consist of all information required to be submitted to IDEM, OAQ in the notices specified in 326 IAC 2-8-15(b)(2), (c)(1), and (d).

- (b) Emission Trades [326 IAC 2-8-15(c)]
The Permittee may trade emissions increases and decreases at the source, where the applicable SIP provides for such emission trades without requiring a permit revision, subject to the constraints of Section (a) of this condition and those in 326 IAC 2-8-15(c).
- (c) Alternative Operating Scenarios [326 IAC 2-8-15(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 2-8-4(7). No prior notification of IDEM, OAQ, or U.S. EPA is required.
- (d) 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.19 Source Modification Requirement [326 IAC 2-8-11.1]

A modification, construction, or reconstruction is governed by the requirements of 326 IAC 2.

B.20 Inspection and Entry [326 IAC 2-8-5(a)(2)][IC 13-14-2-2][IC 13-17-3-2][IC 13-30-3-1]

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

- (a) Enter upon the Permittee's premises where a FESOP source is located, or emissions related activity is conducted, or where records must be kept under the conditions of this permit;
- (b) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- (c) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, inspect, at reasonable times, any facilities, equipment (including monitoring and air

pollution control equipment), practices, or operations regulated or required under this permit;

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

B.21 Transfer of Ownership or Operational Control [326 IAC 2-8-10]

- (a) The Permittee must comply with the requirements of 326 IAC 2-8-10 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
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

Any such application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-8-10(b)(3)]

B.22 Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-8-4(6)] [326 IAC 2-8-16][326 IAC 2-1.1-7]

- (a) The Permittee shall pay annual fees to IDEM, OAQ no later than thirty (30) calendar days of receipt of a billing. Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ the applicable fee is due April 1 of each year.
- (b) Failure to pay may result in administrative enforcement action or revocation of this permit.
- (c) The Permittee may call the following telephone numbers: 1-800-451-6027 or 317-233-4230 (ask for OAQ, Billing, Licensing, and Training Section), to determine the appropriate permit fee.

B.23 Credible Evidence [326 IAC 2-8-4(3)][326 IAC 2-8-5][62 FR 8314] [326 IAC 1-1-6]

For the purpose of submitting compliance certifications or establishing whether or not the Permittee has violated or is in violation of any condition of this permit, nothing in this permit shall preclude the use, including the exclusive use, of any credible evidence or information relevant to whether the Permittee would have been in compliance with the condition of this permit if the appropriate performance or compliance test or procedure had been performed.

SECTION C SOURCE OPERATION CONDITIONS

Entire Source

Emission Limitations and Standards [326 IAC 2-8-4(1)]

C.1 Overall Source Limit [326 IAC 2-8]

The purpose of this permit is to limit this source's potential to emit to less than major source levels for the purpose of Section 502(a) of the Clean Air Act.

- (a) Pursuant to 326 IAC 2-8:
- (1) The potential to emit volatile organic compounds (VOCs) from the entire source shall be limited to less than twenty-five (25) tons per twelve (12) consecutive month period;
 - (2) The potential to emit any regulated pollutant from the entire source, except particulate matter (PM) and volatile organic compounds (VOCs), shall be limited to less than one hundred (100) tons per twelve (12) consecutive month period;
 - (3) The potential to emit any individual hazardous air pollutant (HAP) from the entire source shall be limited to less than ten (10) tons per twelve (12) consecutive month period; and
 - (4) The potential to emit any combination of HAPs from the entire source shall be limited to less than twenty-five (25) tons per twelve (12) consecutive month period.
- (b) Pursuant to 326 IAC 2-2 (PSD), potential to emit particulate matter (PM) from the entire source shall be limited to less than two hundred fifty (250) tons per twelve (12) consecutive month period.
- (c) This condition shall include all emission points at this source including those that are insignificant as defined in 326 IAC 2-7-1(21). The source shall be allowed to add insignificant activities not already listed in this permit, provided the source's potential to emit does not exceed the above specified limits.
- (d) Section D of this permit contains independently enforceable provisions to satisfy this requirement.

C.2 Opacity [326 IAC 5-1]

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

- (a) Opacity shall not exceed an average of twenty percent (20%) 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.

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

The Permittee shall not operate an incinerator except as provided in 326 IAC 4-2 or in this permit. The Permittee shall not operate a refuse incinerator or refuse burning equipment except as provided in 326 IAC 9-1-2 or in this permit.

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).

C.6 Lake County: Particulate Matter Contingency Measures [326 IAC 6.8-11]

The Permittee shall comply with the applicable provisions of 326 IAC 6.8-11 (Lake County: Particulate Matter Contingency Measures).

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

The Permittee shall comply with the applicable provisions of 326 IAC 1-7 (Stack Height Provisions), for all exhaust stacks through which a potential (before controls) of twenty-five (25) tons per year or more of particulate matter or sulfur dioxide is emitted.

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

- (a) Notification requirements apply to each owner or operator. If the combined amount of regulated asbestos containing material (RACM) to be stripped, removed or disturbed 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
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (e) **Procedures for Asbestos Emission Control**
The Permittee shall comply with the applicable emission control procedures in 326 IAC 14-10-4 and 40 CFR 61.145(c). Per 326 IAC 14-10-1, emission control requirements are applicable for any removal or disturbance of RACM greater than three (3) linear feet on pipes or three (3) square feet on any other facility components or a total of at least 0.75 cubic feet on all facility components.
- (f) **Demolition and Renovation**
The Permittee shall thoroughly inspect the affected facility or part of the facility where the demolition or renovation will occur for the presence of asbestos pursuant to 40 CFR 61.145(a).
- (g) **Indiana Licensed 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 Licensed Asbestos Inspector to thoroughly inspect the affected portion of the facility for the presence of asbestos.

Testing Requirements [326 IAC 2-8-4(3)]

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

- (a) For performance testing required by this permit, a test protocol, except as provided elsewhere in this permit, shall be submitted to:

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

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date. The notification submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ if the Permittee submits to IDEM, OAQ a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period.

Compliance Requirements [326 IAC 2-1.1-11]

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

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

Compliance Monitoring Requirements [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]

C.11 Compliance Monitoring [326 IAC 2-8-4(3)][326 IAC 2-8-5(a)(1)]

Unless otherwise specified in this permit, for all monitoring requirements not already legally required, the Permittee shall be allowed up to ninety (90) days from the date of permit issuance or of initial start-up, whichever is later, to begin such monitoring. If due to circumstances beyond the Permittee's control, any monitoring equipment required by this permit cannot be installed and operated no later than ninety (90) days after permit issuance or the date of initial startup, whichever is later, 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 and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

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

The notification which shall be submitted by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

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

C.12 Continuous Compliance Plan [326 IAC 6.8-8-1] [326 IAC 6.8-8-8]

- (a) Pursuant to 326 IAC 326 IAC 6.8-8-1, the Permittee shall submit to IDEM and maintain at source a copy of the Continuous Compliance Plan (CCP). The Permittee shall perform the inspections, monitoring and record keeping in accordance with the information in 326 IAC 6.8-8-5 through 326 IAC 6.8-8-7 or applicable procedures in the CCP.
- (b) Pursuant to 326 IAC 6.8-8-8, the Permittee shall update the CCP, as needed, retain a copy of any changes and updates to the CCP at the source and make the updated CCP available for inspection by the department. The Permittee shall submit the updated CCP, if required to IDEM, OAQ within thirty (30) days of the update.
- (c) Pursuant to 326 IAC 6.8-8, failure to submit a CCP, maintain all information required by the CCP at the source, or submit update to a CCP is a violation of 326 IAC 6.8-8.

C.13 Instrument Specifications [326 IAC 2-1.1-11] [326 IAC 2-8-4(3)][326 IAC 2-8-5(1)]

- (a) When required by any condition of this permit, an analog instrument used to measure a parameter related to the operation of an air pollution control device shall have a scale

such that the expected maximum reading for the normal range shall be no less than twenty percent (20%) of full scale.

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

Corrective Actions and Response Steps [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]

C.14 Risk Management Plan [326 IAC 2-8-4] [40 CFR 68]

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

C.15 Response to Excursions or Exceedances [326 IAC 2-8-4] [326 IAC 2-8-5]

Upon detecting an excursion where a response step is required by the D Section or an exceedance of a limitation in this permit:

- (a) The Permittee shall take reasonable response steps to restore operation of the emissions unit (including any control device and associated capture system) to its normal or usual manner of operation as expeditiously as practicable in accordance with good air pollution control practices for minimizing excess emissions.
- (b) The response shall include minimizing the period of any startup, shutdown or malfunction. The response may include, but is not limited to, the following:
 - (1) initial inspection and evaluation;
 - (2) recording that operations returned or are returning to normal without operator action (such as through response by a computerized distribution control system);
or
 - (3) any necessary follow-up actions to return operation to normal or usual manner of operation.
- (c) A determination of whether the Permittee has used acceptable procedures in response to an excursion or exceedance will be based on information available, which may include, but is not limited to, the following:
 - (1) monitoring results;
 - (2) review of operation and maintenance procedures and records; and/or
 - (3) inspection of the control device, associated capture system, and the process.
- (d) Failure to take reasonable response steps shall be considered a deviation from the permit.
- (e) The Permittee shall record the reasonable response steps taken.

C.16 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-8-4][326 IAC 2-8-5]

- (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 submit a description of its response actions to IDEM, OAQ, no later than seventy-five (75) days after the date of the test.

- (b) A retest to demonstrate compliance shall be performed no later than one hundred eighty (180) days after the date of the test. Should the Permittee demonstrate to IDEM, OAQ that retesting in one hundred eighty (180) days is not practicable, IDEM, OAQ may extend the retesting deadline
- (c) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

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

C.17 General Record Keeping Requirements [326 IAC 2-8-4(3)] [326 IAC 2-8-5]

- (a) Records of all required monitoring data, reports and support information required by this permit shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be physically present or electronically accessible at the source location for a minimum of three (3) years. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.
- (b) Unless otherwise specified in this permit, for all record keeping requirements not already legally required, the Permittee shall be allowed up to ninety (90) days from the date of permit issuance or the date of initial start-up, whichever is later, to begin such record keeping.

C.18 General Reporting Requirements [326 IAC 2-8-4(3)(C)] [326 IAC 2-1.1-11]

- (a) The Permittee 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 except that a deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report. This report shall be submitted not later than thirty (30) days after the end of the reporting period. The Quarterly Deviation and Compliance Monitoring Report shall include a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1). A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.
- (b) The address for report submittal is:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
- (c) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.

- (d) Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

Stratospheric Ozone Protection

C.19 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 applicable standards for recycling and emissions reduction.

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Magnesite Processing

- (a) Magnesite Unloading and Crushing (D-1), identified as PD-1, constructed in 1971, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-1.
- (b) Magnesite Handling & Storage (D-2), identified as PD-2, constructed in 1993, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-2.
- (c) Magnesite Classifying & Milling - East (D-8), identified as PD-8, constructed in 1956, with a maximum rate of 25 tons per hour, using a baghouse as control, and exhausting to stack D-8.
- (d) Batts Crushing & Screening (D-9), identified as PD-9, constructed in 1956, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-9.
- (e) Material Screening & Milling – West (D-11), identified as PD-11, constructed in 1992, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-11.
- (f) Material Screening & Milling – West (D-13), identified as PD-13, constructed in 1956, with a maximum rate of 16 tons per hour, using a baghouse as control, and exhausting to stack D-13.

Mixing Department

- (g) DEV-22 Mixer (D-4), identified as PD-4, constructed in 1996, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-4.
- (h) RV-15 Mixers #1 and #2 (D-21), identified as PD-12B, constructed in 1984, and PD-12C, constructed in 1988, each with a maximum rate of 4.25 tons per hour, using separate baghouses as control, and exhausting to a common stack D-21.
- (i) RV-15 Mixer #3 (D-12D), identified as PD-12D, constructed in 1993, with a maximum rate of 4.25 tons per hour, using a baghouse as control, and exhausting to stack D-12D.
- (j) DE-18 Flat Mixer (D-14), identified as PD-14, constructed in 1993, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-14.

Pressing Department

- (k) Resin Bond Batch (D-12A), identified as PD-12A, constructed in 1996, with a maximum rate of 10.9 tons per hour, using a baghouse as control, and exhausting to stack D-12A.

Drying Department

- (l) Basic Dryer (S-8), identified as PS-8, constructed in 1957, with a maximum drying rate of 4.1 tons per hour and natural gas heat input rate of 13.5 million Btu/hr, exhausting to stack S-8.
- (m) Rotary Dryer (D-10), identified as PD-10, constructed in 1957, with a maximum drying rate of 20 tons per hour and natural gas heat input rate of 3.5 million Btu/hr, using a baghouse as control, and exhausting to stack D-10.

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

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.1.1 FESOP Limits [326 IAC 2-8-4]

In order to comply with the requirements of 326 IAC 2-8-4 (FESOP), the source shall comply with the following:

The PM10 and PM2.5 emissions from the emission units listed shall not exceed the emission limits listed in the table below:

Unit ID	Unit Description / (Stack)	Control Device	PM10 Emission Limit (lbs/hr)	PM2.5 Emission Limit (lbs/hr)
PD-1	Magnesite Unloading and Crushing (D-1)	Baghouse	0.58	0.58
PD-2	Magnesite Handling & Storage (D-2)	Baghouse	0.41	0.41
PD-8	Magnesite Classifying & Milling - East (D-8)	Baghouse	1.28	1.28
PD-9	Batts Crushing & Screening (D-9)	Baghouse	0.49	0.49
PD-11	Material Screening & Milling - West (D-11)	Baghouse	0.41	0.41
PD-13	Material Screening & Milling - West (D-13)	Baghouse	0.70	0.70
PD-4	DEV-22 Mixer (D-4)	Baghouse	0.23	0.23
PD-12B PD-12C	RV-15 Mixers #1 / #2 (D-21)	*Baghouses	1.34	1.34
PD-12D	RV-15 Mixer #3 (D-12D)	Baghouse	0.67	0.67
PD-14	DE-18 Flat Mixer (D-14)	Baghouse	0.23	0.23
PD-12A	Resin Bond Batch (D-12A)	Baghouse	0.25	0.25
PD-10	Rotary Dryer (D-10)	Baghouse	0.64	0.64
PS-8	Basic Dryer (S-8)	N/A	3.02	3.02

* Separate baghouses exhausting to a common stack.

Compliance with these limits, combined with the potential to emit PM10 and PM2.5 from all other emission units, shall limit the source-wide total potential to emit PM10 and PM2.5 to less than 100 tons per 12 consecutive month period, and shall render 326 IAC 2-7 (Part 70 Permits) not applicable.

D.1.2 PSD Minor Limits [326 IAC 2-8-4][326 IAC 2-2]

In order to make the requirements of 326 IAC 2-2 (PSD) not applicable, the source shall comply with the following:

Unit ID	Unit Description / (Stack)	Control Device	PM Emission Limit (lbs/hr)
PD-1	Magnesite Unloading and Crushing (D-1)	Baghouse	8.50
PD-2	Magnesite Handling & Storage (D-2)	Baghouse	0.41
PD-8	Magnesite Classifying & Milling - East (D-8)	Baghouse	10.63
PD-9	Batts Crushing & Screening (D-9)	Baghouse	8.80
PD-11	Material Screening & Milling - West (D-11)	Baghouse	0.41
PD-13	Material Screening & Milling - West (D-13)	Baghouse	6.80
PD-4	DEV-22 Mixer (D-4)	Baghouse	0.23
PD-12B PD-12C	RV-15 Mixers #1 / #2 (D-21)	*Baghouses	1.34
PD-12D	RV-15 Mixer #3 (D-12D)	Baghouse	0.67
PD-14	DE-18 Flat Mixer (D-14)	Baghouse	0.23
PD-12A	Resin Bond Batch (D-12A)	Baghouse	0.25
PD-10	Rotary Dryer (D-10)	Baghouse	0.64
PS-8	Basic Dryer (S-8)	N/A	3.02

* Separate baghouses exhausting to a common stack.

Compliance with these limits, combined with the potential to emit PM from all other emission units, shall limit the source-wide total potential to emit of PM to less than 250 tons per 12 consecutive month period and shall render 326 IAC 2-2 (PSD) not applicable.

D.1.3 Lake County PM10 Emission Requirements [326 IAC 6.8-2-16]

Pursuant to 326 IAC 6.8-2-16, the PM10 emissions from the following emission units at Resco Products, Inc. shall not exceed the pounds per ton and pounds per hour emission limits below:

Unit Description / (Stack)	Unit Description as Specified in 326 IAC 6.8-2-16	Emissions Limits	
		(lbs/ton)	(lbs/hr)
Magnesite Unloading and Crushing PD-1/(D-1)	Magnesite Unloading and Crushing (D-1)	0.017	0.580
Magnesite Handling & Storage PD-2/(D-2)	Magnesite Material Handling and Storage (D-2)	0.012	0.410
Magnesite Classifying & Milling - East PD-8/(D-8)	Magnesite Screening and Milling (East) (D-8)	0.051	1.280
Batts Crushing & Screening PD-9/(D-9)	Bricks (Bats) Crushing (D-9)	0.024	0.490
Material Screening & Milling - West PD-11/(D-11)	Magnesite Handling and Storage (West) (D-11)	0.02	0.410
Material Screening & Milling - West PD-13/(D-13)	Magnesite Screening and Milling (West) (D-13)	0.044	0.700
DEV-22 Mixer PD-4/(D-4)	DEV-22 Mixer #5 (D-4)	0.033	0.230
RV-15 Mixers #1 and #2 PD-12B and PD-12C/(D-21)	3 Tilt Mixers #1, #2, and #3 (D-12B, D-12C, and D-12D)	0.054	0.460
RV-15 Mixer #3 PD-12D/(D-12D)			
DE-18 Flat Mixer PD-14/(D-14)	DE-18 Flat Mixer, Mixer #4 (D-14)	0.0165	0.230
Resin Bond Batch PD-12A/(D-12A)	Resin-Bonded Material Handling, Batching and Pressing (D-12A)	0.25	0.93
Rotary Dryer PD-10/(D-10)	Rotary Dryer (D-10)	0.032	0.640
Basic Dryer PS-8/(S-8)	Basic Dryer (Stack 8)	0.916	3.020

D.1.4 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and their control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

Compliance Determination Requirements

D.1.5 Particulate Control

- (a) The Permittee shall operate the baghouses which control the below listed emission units, as necessary, in order to ensure compliance with Conditions D.1.1, D.1.2, and D.1.3.

Unit ID	Unit Description / (Stack)	Control Device
PD-1	Magnesite Unloading and Crushing (D-1)	Baghouse
PD-2	Magnesite Handling & Storage (D-2)	Baghouse
PD-8	Magnesite Classifying & Milling - East (D-8)	Baghouse
PD-9	Batts Crushing & Screening (D-9)	Baghouse
PD-11	Material Screening & Milling - West (D-11)	Baghouse
PD-13	Material Screening & Milling - West (D-13)	Baghouse
PD-4	DEV-22 Mixer (D-4)	Baghouse
PD-12B PD-12C	RV-15 Mixers #1 / #2 (D-21)	Baghouse
PD-12D	RV-15 Mixer #3 (D-12D)	Baghouse
PD-14	DE-18 Flat Mixer (D-14)	Baghouse
PD-12A	Resin Bond Batch (D-12A)	Baghouse
PD-10	Rotary Dryer (D-10)	Baghouse
PS-8	Basic Dryer (S-8)	N/A

- (b) In the event that bag failure is observed in a multi-compartment baghouse, if operations will continue for ten (10) days or more after the failure is observed before the failed units will be repaired or replaced, the Permittee shall promptly notify the IDEM, OAQ of the expected date the failed units will be repaired or replaced. The notification shall also include the status of the applicable compliance monitoring parameters with respect to normal, and the results of any response actions taken up to the time of notification.

D.1.6 Testing Requirements [326 IAC 2-8-5(a)(1),(4)] [326 IAC 2-1.1-11]

- (a) In order to demonstrate compliance with Conditions D.1.1 and D.1.3, the Permittee shall perform PM10 testing for the baghouse controlling the Resin Bond Batch (PD-12A) not later than five (5) years after the date of the most recent valid compliance demonstration, utilizing methods as approved by the Commissioner. These tests shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration.
- (b) In order to demonstrate compliance with Conditions D.1.1 and D.1.3, the Permittee shall perform PM10 testing for the Basic Dryer (PS-8) stack exhaust (S-8) not later than five (5) years after the date of the most recent valid compliance demonstration, utilizing methods as approved by the Commissioner. These tests shall be repeated at least once every five (5) years from the date of the most recent valid compliance demonstration.

Testing shall be conducted in accordance with the provisions of 326 IAC 3-6 (Source Sampling Procedures). Section C – Performance Testing contains the Permittee’s obligation with regard to the performance testing required by this condition. PM-10 includes filterable and condensable particulate matter.

Compliance Monitoring Requirements [326 IAC 2-8-4] [326 IAC 2-8-5(a)(1)]

D.1.7 Visible Emissions Notations

The Permittee shall comply with the following:

- (a) Visible emission notations of the baghouse stack exhausts (stacks D-1, D-2, D-8, D-9, D-11, D-13, D-4, D-21, D-12D, D-14, D-12A, and D-10) and Basic Dryer stack (S-8) exhaust shall be performed once per day during normal daylight operations. A trained employee shall record whether emissions are normal or abnormal.
- (b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.

- (c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to cause the greatest emissions.
- (d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.
- (e) If abnormal emissions are observed, the Permittee shall take reasonable response steps. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

D.1.8 Parametric Monitoring

- (a) The Permittee shall record the pressure drop across each of the baghouses used in conjunction with PD-1, PD-2, PD-8, PD-9, PD-11, PD-13, PD-12A, and PD-10, at least once per day when these units are in operation. When for any one reading, the pressure drop across the baghouse is outside the normal range of 2.0 to 8.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps.
- (b) The Permittee shall record the pressure drop across each of the baghouses used in conjunction with PD-4, PD-12B and PD12C, PD-12D, and PD-14 at least once per day when these units are in operation. When for any one reading, the pressure drop across the baghouse is outside the normal range of 1.0 to 7.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps.

Section C – Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by these conditions. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

The instrument used for determining the pressure shall comply with Section C - Instrument Specifications, of this permit, shall be subject to approval by IDEM, OAQ and shall be calibrated or replaced at least once every six (6) months.

D.1.9 Broken or Failed Bag Detection

- (a) For a single compartment baghouse controlling emissions from a process operated continuously, a failed unit and the associated process shall be shut down immediately until the failed unit has been repaired or replaced. Operations may continue only if the event qualifies as an emergency and the Permittee satisfies the requirements of the emergency provisions of this permit (Section B - Emergency Provisions).
- (b) For a single compartment baghouse controlling emissions from a batch process, the feed to the process shall be shut down immediately until the failed unit has been repaired or replaced. The emissions unit shall be shut down no later than the completion of the processing of the material in the line. Operations may continue only if the event qualifies as an emergency and the Permittee satisfies the requirements of the emergency provisions of this permit (Section B - Emergency Provisions).

Bag failure can be indicated by a significant drop in the baghouse's pressure reading with abnormal visible emissions, by an opacity violation, or by other means such as gas temperature, flow rate, air infiltration, leaks, dust traces or triboflows.

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

D.1.10 Record Keeping Requirement

- (a) To document the compliance status with Condition D.1.7, the Permittee shall maintain a daily record of visible emission notations for each of the baghouse stack exhausts. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of visible emission notation (e.g. the process did not operate that day).
- (b) To document the compliance status with Conditions D.1.8(a) and D.1.8(b), the Permittee shall maintain a daily record of the pressure drops for each of the baghouses during normal operation. The Permittee shall include in its daily record when a pressure drop reading is not taken and the reason for the lack of a pressure drop reading (e.g. the process did not operate that day).
- (c) Section C - General Record Keeping Requirements contains the Permittee's obligation with regard to the recordkeeping requirements of this requirement.

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Batching Department

- (n) Material Receiving Vessel Vent (D-12E), identified as PD-12E, constructed in 1993, with a maximum rate of 18 tons per hour, using a baghouse as control, and exhausting to stack D-12E.
- (o) Graphite Transport (D-19), identified as PD-19, constructed in 1993, with a maximum rate of 6 tons per hour, using a baghouse as control, and exhausting to stack D-19.
- (p) Minor Additive Transport (D-20), identified as PD-20, constructed in 1993, with a maximum rate of 0.75 tons per hour, using a bin vent as control, and exhausting to stack D-20.
- (q) Batch Station Transport (D-22), identified as PD-22, constructed in 1996, with a maximum rate of 14 tons per hour, using a baghouse as control, and exhausting to stack D-22.

Montco Line

- (r) Montco Line (S-30), identified as PS-30, constructed in 2001, with a maximum rate of 10 tons per hour, using a jet pulse cartridge dust collector as control, and exhausting to stack S-30.

Kiln

- (s) One (1) natural gas-fired kiln, identified as the Bickley Periodic Elevator Kiln, installed in 2006, with a maximum unfired raw refractory rate of 3500 tons per year and a maximum heat input capacity of 21 MMBtu/hr, and exhausting to stack #2 TK.

Refractory Liquids System

- (t) One (1) Refractory Liquids system, identified as PS-31, approved for construction in 2011, and consisting of:
 - (1) One (1) 2,000 gallon closed blending tank, equipped with a bag filter for particulate control, and exhausting within the building.
 - (2) One (1) 6,000 gallon methanol storage tank.

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

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.2.1 Particulate Matter [326 IAC 6.8-1-2(a)]

- (a) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Material Receiving Vessel Vent (PD-12E), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (b) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Graphite Transport (PD-19), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

- (c) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Minor Additive Transport (PD-20), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (d) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Batch Station Transport (PD-22), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (e) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Montco Line, identified as S-30, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (f) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Bickley Periodic Elevator Kiln, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (g) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Refractory Liquids System, identified as PS-31, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

D.2.2 Volatile Organic Liquid Storage Vessels [326 IAC 8-9]

Pursuant to 326 IAC 8-9, the Permittee shall maintain a record and a report containing the following information for the methanol storage tank:

- (a) The vessel identification number
- (b) The vessels dimension
- (c) The vessel capacity.

The report shall be submitted to:

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

D.2.3 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and their control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

Compliance Determination Requirements

D.2.4 Particulate Control

- (a) The Permittee shall operate the baghouse controlling the Montco Line (PS-30) at all times the emission unit is in operation in order to ensure compliance with Condition D.2.1(e).
- (b) In the event that bag failure is observed in a multi-compartment baghouse, if operations will continue for ten (10) days or more after the failure is observed before the failed units will be repaired or replaced, the Permittee shall promptly notify the IDEM, OAQ of the expected date the failed units will be repaired or replaced. The notification shall also include the status of the applicable compliance monitoring parameters with respect to

normal, and the results of any response actions taken up to the time of notification.

Compliance Monitoring Requirements [326 IAC 2-8-4] [326 IAC 2-8-5(a)(1)]

D.2.5 Visible Emissions Notations

The Permittee shall comply with the following:

- (a) Visible emission notations of the Montco Line baghouse stack exhaust (stack S-30) shall be performed once per day during normal daylight operations. A trained employee shall record whether emissions are normal or abnormal.
- (b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
- (c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to cause the greatest emissions.
- (d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.
- (e) If abnormal emissions are observed, the Permittee shall take reasonable response steps. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

D.2.6 Parametric Monitoring

The Permittee shall record the pressure drop across the baghouse used in conjunction with the Montco Line (PS-30) at least once per day when the unit is in operation. When for any one reading, the pressure drop across the baghouse is outside the normal range of 2.0 to 8.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps. Section C – Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

The instrument used for determining the pressure shall comply with Section C - Instrument Specifications, of this permit, shall be subject to approval by IDEM, OAQ and shall be calibrated or replaced at least once every six (6) months.

D.2.7 Broken or Failed Bag Detection

- (a) For a single compartment baghouse controlling emissions from a process operated continuously, a failed unit and the associated process shall be shut down immediately until the failed unit has been repaired or replaced. Operations may continue only if the event qualifies as an emergency and the Permittee satisfies the requirements of the emergency provisions of this permit (Section B - Emergency Provisions).
- (b) For a single compartment baghouse controlling emissions from a batch process, the feed to the process shall be shut down immediately until the failed unit has been repaired or replaced. The emissions unit shall be shut down no later than the completion of the processing of the material in the line. Operations may continue only if the event qualifies as an emergency and the Permittee satisfies the requirements of the emergency provisions of this permit (Section B - Emergency Provisions).

Bag failure can be indicated by a significant drop in the baghouse's pressure reading with

abnormal visible emissions, by an opacity violation, or by other means such as gas temperature, flow rate, air infiltration, leaks, dust traces or triboflows.

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

D.2.8 Record Keeping Requirement

- (a) To document the compliance status with Condition D.2.5, the Permittee shall maintain a daily record of visible emission notations for the Montco Line (PS-30) baghouse stack exhaust. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of visible emission notation (e.g. the process did not operate that day).
- (b) To document the compliance status with Condition D.2.6, the Permittee shall maintain a daily record of pressure drop for the Montco Line baghouse during normal operation. The Permittee shall include in its daily record when a pressure drop reading is not taken and the reason for the lack of a pressure drop reading (e.g. the process did not operate that day).
- (c) Section C - General Record Keeping Requirements contains the Permittee's obligation with regard to the recordkeeping requirements of this requirement.

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
CERTIFICATION**

Source Name: Resco Products, Inc.
Source Address: 5501 Kennedy Avenue, Hammond, Indiana 46323
FESOP Permit No.: F089-29427-00222

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

Please check what document is being certified:

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

I certify that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

Signature:

Printed Name:

Title/Position:

Date:

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

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
EMERGENCY OCCURRENCE REPORT**

Source Name: Resco Products, Inc.
Source Address: 5501 Kennedy Avenue, Hammond, Indiana 46323
FESOP Permit No.: F089-29427-00222

This form consists of 2 pages

Page 1 of 2

- | |
|--|
| <p><input type="checkbox"/> This is an emergency as defined in 326 IAC 2-7-1(12)</p> <ul style="list-style-type: none">• The Permittee must notify the Office of Air Quality (OAQ), within four (4) business hours (1-800-451-6027 or 317-233-0178, ask for Compliance Section); and• The Permittee must submit notice in writing or by facsimile within two (2) working days (Facsimile Number: 317-233-6865), and follow the other requirements of 326 IAC 2-7-16 |
|--|

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

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

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

Page 2 of 2

Date/Time Emergency started:
Date/Time Emergency was corrected:
Was the facility being properly operated at the time of the emergency? Y N Describe:
Type of Pollutants Emitted: TSP, PM-10, SO ₂ , VOC, NO _x , CO, Pb, other:
Estimated amount of pollutant(s) emitted during emergency:
Describe the steps taken to mitigate the problem:
Describe the corrective actions/response steps taken:
Describe the measures taken to minimize emissions:
If applicable, describe the reasons why continued operation of the facilities are necessary to prevent imminent injury to persons, severe damage to equipment, substantial loss of capital investment, or loss of product or raw materials of substantial economic value:

Form Completed by: _____

Title / Position: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
 OFFICE OF AIR QUALITY
 COMPLIANCE AND ENFORCEMENT BRANCH
 FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
 QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT**

Source Name: Resco Products, Inc.
 Source Address: 5501 Kennedy Avenue, Hammond, Indiana 46323
 FESOP Permit No.: F089-29427-00222

Months: _____ to _____ Year: _____

This report shall be submitted quarterly based on a calendar year. Any deviation from the requirements of this permit, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. A deviation required to be reported pursuant to an applicable requirement that exists independent of the permit, shall be reported according to the schedule stated in the applicable requirement and does 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".	
<input type="checkbox"/> NO DEVIATIONS OCCURRED THIS REPORTING PERIOD.	
<input type="checkbox"/> 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: _____

**Indiana Department of Environmental Management
Office of Air Quality**

Addendum to the Technical Support Document (ATSD) for a
Federally Enforceable State Operating Permit (FESOP) Renewal

Source Background and Description

Source Name:	Resco Products, Inc.
Source Location:	5501 Kennedy Avenue, Hammond, IN 46323
County:	Lake
SIC Code:	3297
Permit Renewal No.:	F089-29427-00222
Permit Reviewer:	Jason R. Krawczyk

On March 1, 2011, the Office of Air Quality (OAQ) had a notice published in The Post Tribune, Merrillville, Indiana, stating that Resco Products, Inc. had applied to renew their FESOP F089-21631-00222, issued on April 5, 2006. The notice also stated that the OAQ proposed to issue a FESOP Renewal 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.

Comments and Responses

No comments were received during the public notice period.

Additional Changes

IDEM, OAQ has decided to make additional revisions to the permit as described below, with deleted language as ~~strikeouts~~ and new language **bolded**.

- (1) The emission unit description for the minor additive transport (D-20) is being revised to properly reflect the type of particulate control being utilized. The minor additive transport uses a bin vent for particulate control. The materials are transported to the mixers, which utilize baghouses.

...

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

This stationary source consists of the following emission units and pollution control devices:

...

Batching Department

...

- (p) Minor Additive Transport (D-20), identified as PD-20, constructed in 1993, with a maximum rate of 0.75 tons per hour, using a ~~baghouse~~ **bin vent** as control, and exhausting to stack D-20.

...

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Batching Department

...

(p) Minor Additive Transport (D-20), identified as PD-20, constructed in 1993, with a maximum rate of 0.75 tons per hour, using a ~~baghouse~~ **bin vent** as control, and exhausting to stack D-20.

...

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

...

(2) Condition D.1.8(b) is being revised to correct a typographical error.

...

D.1.8 Parametric Monitoring

...

(b) The Permittee shall record the pressure drop across each of the baghouses used in conjunction with PD-4, ~~PD-24~~ **PD-12B and PD-12C**, PD-12D, and PD-14 at least once per day when these units are in operation. When for any one reading, the pressure drop across the baghouse is outside the normal range of 1.0 to 7.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps.

...

IDEM Contact

- (a) Questions regarding this proposed FESOP Renewal can be directed to Jason R. Krawczyk at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 234-5174 or toll free at 1-800-451-6027 extension 4-5174.
- (b) A copy of the permit is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>
- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM's Guide for Citizen Participation and Permit Guide on the Internet at: www.idem.in.gov

Indiana Department of Environmental Management Office of Air Quality

Technical Support Document (TSD) for a Federally Enforceable State Operating Permit (FESOP) Renewal

Source Description and Location
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Source Name:	Resco Products, Inc.
Source Location:	5501 Kennedy Avenue, Hammond, IN 46323
County:	Lake
SIC Code:	3297
Permit Renewal No.:	F089-29427-00222
Permit Reviewer:	Jason R. Krawczyk

On July 2, 2010, the Office of Air Quality (OAQ) received an application from Resco Products, Inc. to renew their Federally Enforceable State Operating Permit (FESOP). Resco Products, Inc. was issued FESOP 089-21631-00222 on April 5, 2006 for a stationary refractory products manufacturing facility.

Background and Description of Permitted Emission Units

The source consists of the following permitted emission units:

Magnesite Processing

- (a) Magnesite Unloading and Crushing (D-1), identified as PD-1, constructed in 1971, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-1.
- (b) Magnesite Handling & Storage (D-2), identified as PD-2, constructed in 1993, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-2.
- (c) Magnesite Classifying & Milling - East (D-8), identified as PD-8, constructed in 1956, with a maximum rate of 25 tons per hour, using a baghouse as control, and exhausting to stack D-8.
- (d) Batts Crushing & Screening (D-9), identified as PD-9, constructed in 1956, with a maximum rate of 20 tons per hour, using a baghouse as control, and exhausting to stack D-9.
- (e) Material Screening & Milling – West (D-11), identified as PD-11, constructed in 1992, with a maximum rate of 12 tons per hour, using a baghouse as control, and exhausting to stack D-11.
- (f) Material Screening & Milling – West (D-13), identified as PD-13, constructed in 1956, with a maximum rate of 16 tons per hour, using a baghouse as control, and exhausting to stack D-13.

Mixing Department

- (g) DEV-22 Mixer (D-4), identified as PD-4, constructed in 1996, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-4.
- (h) RV-15 Mixers #1 and #2 (D-21), identified as PD-12B, constructed in 1984, and PD-12C, constructed in 1988, each with a maximum rate of 4.25 tons per hour, using separate baghouses as control, and exhausting to a common stack D-21.
- (i) RV-15 Mixer #3 (D-12D), identified as PD-12D, constructed in 1993, with a maximum rate of 4.25 tons per hour, using a baghouse as control, and exhausting to stack D-12D.

- (j) DE-18 Flat Mixer (D-14), identified as PD-14, constructed in 1993, with a maximum rate of 11.2 tons per hour, using a baghouse as control, and exhausting to stack D-14.

Batching Department

- (k) Material Receiving Vessel Vent (D-12E), identified as PD-12E, constructed in 1993, with a maximum rate of 18 tons per hour, using a baghouse as control, and exhausting to stack D-12E.
- (l) Graphite Transport (D-19), identified as PD-19, constructed in 1993, with a maximum rate of 6 tons per hour, using a baghouse as control, and exhausting to stack D-19.
- (m) Minor Additive Transport (D-20), identified as PD-20, constructed in 1993, with a maximum rate of 0.75 tons per hour, using a baghouse as control, and exhausting to stack D-20.
- (n) Batch Station Transport (D-22), identified as PD-22, constructed in 1996, with a maximum rate of 14 tons per hour, using a baghouse as control, and exhausting to stack D-22.

Pressing Department

- (o) Resin Bond Batch (D-12A), identified as PD-12A, constructed in 1996, with a maximum rate of 10.9 tons per hour, using a baghouse as control, and exhausting to stack D-12A.

Drying Department

- (p) Basic Dryer (S-8), identified as PS-8, constructed in 1957, with a maximum drying rate of 4.1 tons per hour and natural gas heat input rate of 13.5 million Btu/hr, exhausting to stack S-8.
- (q) Rotary Dryer (D-10), identified as PD-10, constructed in 1957, with a maximum drying rate of 20 tons per hour and natural gas heat input rate of 3.5 million Btu/hr, using a baghouse as control, and exhausting to stack D-10.

Montco Line

- (r) Montco Line (S-30), identified as PS-30, constructed in 2001, with a maximum rate of 10 tons per hour, using a jet pulse cartridge dust collector as control, and exhausting to stack S-30.

Kiln

- (s) One (1) natural gas-fired kiln, identified as the Bickley Periodic Elevator Kiln, installed in 2006, with a maximum unfired raw refractory rate of 3500 tons per year and a maximum heat input capacity of 21 MMBtu/hr, and exhausting to stack #2 TK.

Description of New Emission Units
--

The following emission unit is being added to the source:

Refractory Liquids System

- (a) One (1) Refractory Liquids system, identified as PS-31, approved for construction in 2011, and consisting of:
 - (1) One (1) 2,000 gallon closed blending tank, equipped with a bag filter for particulate control, and exhausting within the building.
 - (2) One (1) 6,000 gallon methanol storage tank.

Unpermitted Emission Units and Pollution Control Equipment

There are no unpermitted emission units operating at the source at the time of this permit review.

Emission Units and Pollution Control Equipment Removed From the Source

There have been no emission units removed from the source since the last permit approval.

Insignificant Activities

The source also consists of the following insignificant activities:

- (a) Space heaters, process heaters, or boilers using natural gas-fired combustion sources with heat input equal to or less than ten million (10,000,000) Btu per hour.
- (b) Equipment powered by internal combustion engines of capacity equal to or less than 500,000 Btu/hour, except where total capacity of equipment operated by one stationary source exceeds 2,000,000 Btu/hour.
- (c) Combustion source flame safety purging on startup.
- (d) VOC and HAP vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids.
- (e) Refractory storage not requiring air pollution control equipment.
- (f) Machining where an aqueous cutting coolant continuously floods the machining interface.
- (g) Any operation using aqueous solutions containing less than 1% by weight of VOC excluding HAPs.
- (h) Replacement or repair of electrostatic precipitators, bags in baghouses and filters in other air filtration equipment.
- (i) Paved and unpaved roads and parking lots with public access.
- (j) Purging of gas lines and vessels that is related to routine maintenance and repair of buildings, structures, or vehicles from the source where air emissions from those activities would not be associated with any production process.
- (k) Blowdown for any of the following: sight glass; boiler; compressors; pumps; and cooling tower.
- (l) Emergency gasoline generators not exceeding 110 horsepower.
- (m) Stationary fire pumps.
- (n) Purge double block and bleed valves.
- (o) Mold release agents using low volatile products (vapor pressure less than or equal to 2 kilopascals measured at 38 degrees C).
- (p) A laboratory as defined in 326 IAC 2-7-1(21)(D).

Existing Approvals

Since the issuance of the FESOP 089-21631-00222 on April 5, 2006, the source has constructed or has been operating under the following additional approvals:

- (a) Administrative Amendment No. 089-22486-00222 issued on May 9, 2006; and
- (b) Administrative Amendment No. 089-22486-00222 issued on May 22, 2009;

All terms and conditions of previous permits issued pursuant to permitting programs approved into the State Implementation Plan have been either incorporated as originally stated, revised, or deleted by this permit. All previous registrations and permits are superseded by this permit.

Enforcement Issue

There are no enforcement actions pending.

County Attainment Status

The source is located in Lake County.

Pollutant	Designation
SO ₂	Better than national standards.
CO	Attainment effective February 18, 2000, for the part of the city of East Chicago bounded by Columbus Drive on the north; the Indiana Harbor Canal on the west; 148 th Street, if extended, on the south; and Euclid Avenue on the east. Unclassifiable or attainment effective November 15, 1990, for the remainder of East Chicago and Lake County.
O ₃	Attainment effective June 4, 2010. ¹
PM ₁₀	Attainment effective March 11, 2003, for the cities of East Chicago, Hammond, Whiting, and Gary. Unclassifiable effective November 15, 1990, for the remainder of Lake County.
NO ₂	Cannot be classified or better than national standards.
Pb	Not designated.

¹The U. S. EPA has acknowledged in both the proposed and final rulemaking for this redesignation that the anti-backsliding provisions for the 1-hour ozone standard no longer apply as a result of the redesignation under the 8-hour ozone standard. Therefore, permits in Lake County are no longer subject to review pursuant to Emission Offset, 326 IAC 2-3.
Basic nonattainment designation effective federally April 5, 2005, for PM_{2.5}.

- (a) **Ozone Standards**
Volatile organic compounds (VOC) and Nitrogen Oxides (NO_x) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NO_x emissions are considered when evaluating the rule applicability relating to ozone. Lake 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.
- (b) **PM_{2.5}**
U.S. EPA, in the Federal Register Notice 70 FR 943 dated January 5, 2005, has designated Lake County as nonattainment for PM_{2.5}. On March 7, 2005 the Indiana Attorney General's Office, on behalf of IDEM, filed a lawsuit with the Court of Appeals for the District of Columbia Circuit challenging U.S. EPA's designation of nonattainment areas without sufficient data. However, in order to ensure that sources are not potentially liable for a violation of the Clean Air Act, the OAQ is following the U.S. EPA's New Source Review Rule for PM_{2.5} promulgated on May 8, 2008. These rules became effective on July 15, 2008. Therefore, direct PM_{2.5} and SO₂ emissions were

reviewed pursuant to the requirements of Nonattainment New Source Review, 326 IAC 2-1.1-5. See the State Rule Applicability – Entire Source section.

(c) Other Criteria Pollutants

Lake County has been classified as attainment or unclassifiable in Indiana for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

Fugitive Emissions

Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2, 326 IAC 2-3, or 326 IAC 2-7, and there is no applicable New Source Performance Standard that was in effect on August 7, 1980, fugitive emissions are not counted toward the determination of PSD, Emission Offset, and Part 70 Permit applicability.

Emission Calculations

See Appendix A of this document for detailed emission calculations.

Unrestricted Potential Emissions

The following table reflects the unlimited potential to emit (PTE) of the entire source before controls. Control equipment is not considered federally enforceable until it has been required in a federally enforceable permit.

Pollutant	tons/year
PM	Greater than 250
PM ₁₀	Greater than 250
PM _{2.5}	Greater than 250
SO ₂	Less than 25
VOC	Less than 25
CO	Greater than 25, Less than 100
NO _x	Less than 25

- (1) Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM10), not particulate matter (PM), is considered as a "regulated air pollutant". US EPA has directed states to regulate PM10 emissions as surrogate for PM2.5 emissions.

HAPs	tons/year
Single	Less than 10
Combined	Less than 25

Appendix A of this TSD reflects the unrestricted potential emissions of the source.

- (a) The potentials to emit (as defined in 326 IAC 2-7-1(29)) of PM10, PM2.5, VOC, CO, and NOx are equal to or greater than 100 tons per year. The source would have been subject to the provisions of 326 IAC 2-7. However, the source will be issued a New Source Construction Permit (326 IAC 2-5.1-3) and a Federally Enforceable State Operating Permit (FESOP) Renewal (326 IAC 2-8), because the source will limit emissions to less than the Title V major source threshold levels.
- (b) The potential to emit (as defined in 326 IAC 2-7-1(29)) of all other criteria pollutants are less than 100 tons per year.

- (c) The potential to emit (as defined in 326 IAC 2-7-1(29)) of any single HAP is less than ten (10) tons per year and the potential to emit (as defined in 326 IAC 2-7-1(29)) of a combination of HAPs is less than twenty-five (25) tons per year.

Potential to Emit After Issuance

The source has opted to remain a FESOP source. The table below summarizes the potential to emit, reflecting all limits of the emission units. Any control equipment is considered enforceable only after issuance of this FESOP and only to the extent that the effect of the control equipment is made practically enforceable in the permit.

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Renewal (tons/year)								
	PM	PM10*	PM2.5	SO ₂	NO _x	VOC	CO	Total HAPs	Worst Single HAP
Nat. Gas Combustion	0.14	0.57	0.57	0.04	7.45	0.41	6.25	0.14	0.13 Hexane
Magnesite Processing									
Magnesite Unloading and Crushing (PD-1) ¹	37.23	2.54	2.54	-	-	-	-	-	-
Magnesite Handling & Storage (PD-2) ¹	1.80	1.80	1.80	-	-	-	-	-	-
Magnesite Classifying & Milling - East (PD-8) ¹	46.56	5.61	5.61	-	-	-	-	-	-
Batts Crushing & Screening (PD-9) ¹	38.54	2.15	2.15	-	-	-	-	-	-
Material Screening & Milling - West (PD-11) ¹	1.80	1.80	1.80	-	-	-	-	-	-
Material Screening & Milling - West (PD-13) ¹	29.78	3.07	3.07	-	-	-	-	-	-
Mixing Department									
DEV-22 Mixer (PD-4) ¹	1.01	1.01	1.01	-	-	-	-	-	-
RV-15 Mixers #1 / #2 (PD-12B & PD-12C) ¹	1.34	2.01	1.34	-	-	-	-	-	-
RV-15 Mixer #3 (PD-12D) ¹	0.67		0.67	-	-	-	-	-	-
DE-18 Flat Mixer (PD-14) ¹	1.01	1.01	1.01	-	-	-	-	-	-
Batching Department									
Material Receiving Vessel Vent (PD-12E)	0.24	0.09	0.09	-	-	-	-	-	-
Graphite Transfer (PD-19)	0.08	0.03	0.03	-	-	-	-	-	-
Minor Additive Transport (PD-20)	0.01	negl.	negl.	-	-	-	-	-	-
Batch Station Transport (PD-22)	0.18	0.07	0.07	-	-	-	-	-	-
Resin Bond Batch (PD-12A) ¹	4.07	4.07	4.07	-	-	-	-	-	-
Rotary Dryer (PD-10) ¹	2.80	2.80	2.80	-	-	-	-	-	-
Basic Dryer (PS-8) ¹	17.24	13.23	3.74	12.03	6.29	0.50	21.55	0.07	0.05 Benzene
Montco Line (PS-30)	9.90	3.51	3.46	-	-	-	-	-	-
Bickley Periodic Elevator Kiln	1.85	2.22	2.22	1.23	10.07	1.89	9.83	0.17	0.17 Hexane
Refractory Liquid System (PS-31)	5.78	2.05	2.05	-	-	0.06	-	0.06	0.06 Methanol
Paved Roads (Fugitive)	1.17	0.23	0.06	-	-	-	-	-	-

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Renewal (tons/year)								
	PM	PM10*	PM2.5	SO ₂	NO _x	VOC	CO	Total HAPs	Worst Single HAP
Total PTE of Entire Source	202.03	49.62	40.08	13.30	23.80	5.31	37.63	0.44	0.30 Hexane
Title V Major Source Thresholds	NA	100	100	100	100	100	100	25	10
PSD Major Source Thresholds	250	250	NA	250	250	250	250	NA	NA
Nonattainment NSR Major Source Thresholds	NA	NA	100	NA	NA	NA	NA	NA	NA

negl. = negligible
 *Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM10), not particulate matter (PM), is considered as a "regulated air pollutant".

¹ Emission unit is specifically listed in 326 IAC 6.8-2-16 and has corresponding PM10 lb/ton and lb/hr emission limits. The lb/hr limit was used in determining annual emissions (ton/yr).

Fugitive emissions are not counted toward the determination of PSD, Emission Offset, and Part 70 Permit applicability.

(a) FESOP Status

This existing source is not a Title V major stationary source, because the potential to emit criteria pollutants from the entire source will continue to be limited to less than the Title V major source threshold levels. In addition, this existing source is not a major source of HAPs, as defined in 40 CFR 63.41, because the potential to emit HAPs is less than ten (10) tons per year for a single HAP and twenty-five (25) tons per year of total HAPs. Therefore, this source is an area source under Section 112 of the Clean Air Act and is subject to the provisions of 326 IAC 2-8 (FESOP).

In order to comply with the requirements of 326 IAC 2-8-4 (FESOP), the source shall comply with the following:

The PM10 and PM2.5 emissions from the emission units listed shall not exceed the emission limits listed in the table below:

Unit ID	Unit Description / (Stack)	Control Device	PM10 Emission Limit (lbs/hr)	PM2.5 Emission Limit (lbs/hr)
PD-1	Magnesite Unloading and Crushing (D-1)	Baghouse	0.58	0.58
PD-2	Magnesite Handling & Storage (D-2)	Baghouse	0.41	0.41
PD-8	Magnesite Classifying & Milling - East (D-8)	Baghouse	1.28	1.28
PD-9	Batts Crushing & Screening (D-9)	Baghouse	0.49	0.49
PD-11	Material Screening & Milling - West (D-11)	Baghouse	0.41	0.41
PD-13	Material Screening & Milling - West (D-13)	Baghouse	0.70	0.70
PD-4	DEV-22 Mixer (D-4)	Baghouse	0.23	0.23
PD-12B PD-12C	RV-15 Mixers #1 / #2 (D-21)	*Baghouses	1.34	1.34
PD-12D	RV-15 Mixer #3 (D-12D)	Baghouse	0.67	0.67
PD-14	DE-18 Flat Mixer (D-14)	Baghouse	0.23	0.23
PD-12A	Resin Bond Batch (D-12A)	Baghouse	0.25	0.25
PD-10	Rotary Dryer (D-10)	Baghouse	0.64	0.64
PS-8	Basic Dryer (S-8)	N/A	3.02	3.02

* Separate baghouses exhausting to a common stack.

Compliance with these limits, combined with the potential to emit PM10 and PM2.5 from all other emission units, shall limit the source-wide total potential to emit PM10 and PM2.5 to less than 100 tons per 12 consecutive month period, and shall render 326 IAC 2-7 (Part 70 Permits) not applicable.

Note: The PM10 FESOP limits for the Montco Line (PS-30), which limited the emission unit to 0.0802 lbs/ton and 0.802 lbs/hr are not being included in this FESOP Renewal. The limits are unnecessary in maintaining emission levels below Title V levels since they were set equal to the uncontrolled potential to emit PM10 for the emission unit. The emission unit is however subject to 326 IAC 6.8-1-2(a), which will be incorporated into the permit.

(b) PSD Minor Source

This existing source is not a major stationary source, under PSD (326 IAC 2-2), because the potential to emit PM is limited to less than 250 tons per year and the potential to emit all other attainment regulated pollutants are less than 250 tons per year, and this source is not one of the twenty-eight (28) listed source categories, as specified in 326 IAC 2-2-1(gg)(1). Therefore, pursuant to 326 IAC 2-2, the PSD requirements do not apply.

In order to make the requirements of 326 IAC 2-2 (PSD) not applicable, the source shall comply with the following:

Unit ID	Unit Description / (Stack)	Control Device	PM Emission Limit (lbs/hr)
PD-1	Magnesite Unloading and Crushing (D-1)	Baghouse	8.50
PD-2	Magnesite Handling & Storage (D-2)	Baghouse	0.41
PD-8	Magnesite Classifying & Milling - East (D-8)	Baghouse	10.63
PD-9	Batts Crushing & Screening (D-9)	Baghouse	8.80
PD-11	Material Screening & Milling - West (D-11)	Baghouse	0.41
PD-13	Material Screening & Milling - West (D-13)	Baghouse	6.80
PD-4	DEV-22 Mixer (D-4)	Baghouse	0.23
PD-12B PD-12C	RV-15 Mixers #1 / #2 (D-21)	*Baghouses	1.34
PD-12D	RV-15 Mixer #3 (D-12D)	Baghouse	0.67
PD-14	DE-18 Flat Mixer (D-14)	Baghouse	0.23
PD-12A	Resin Bond Batch (D-12A)	Baghouse	0.25
PD-10	Rotary Dryer (D-10)	Baghouse	0.64
PS-8	Basic Dryer (S-8)	N/A	3.02

* Separate baghouses exhausting to a common stack.

Compliance with these limits, combined with the potential to emit PM from all other emission units, shall limit the source-wide total potential to emit of PM to less than 250 tons per 12 consecutive month period and shall render 326 IAC 2-2 (PSD) not applicable.

Note: PSD Minor limits for PD-1, PD-8, PD-9, and PD-13 are set equal to the controlled PTE of these units utilizing a control device with a ninety-five percent (95%) control efficiency.

All other PSD Minor limits are set equal to the 326 IAC 6.8-2-16 PM10 limits for the corresponding units. The source has claimed a PM control efficiency of 99.49 % for each of these units' associated control devices.

See the State Rule Applicability portion of this TSD for detailed emission unit limits.

Federal Rule Applicability

New Source Performance Standards (NSPS)

- (a) The requirements of the New Source Performance Standard for Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984, 40 CFR Part 60, Subpart Kb (326 IAC 12), are not being included in this permit. Although the tanks will be constructed after July 23, 1984 and used to store volatile organic liquids, the design storage capacities of the blending tank and methanol storage tank are less than seventy-five (75) cubic meters, each.
- (b) The requirements of the New Source Performance Standard for Metallic Mineral Processing Plants, 40 CFR 60, Subpart LL (326 IAC 12), are not included in the permit, since the source does not meet the definition of a metallic mineral processing plant, as defined in 40 CFR 60.381.
- (c) The requirements of the New Source Performance Standard for Nonmetallic Mineral Processing Plant, 40 CFR 60, Subpart OOO (326 IAC 12), are not included in the permit, since the source does not meet the definition of a nonmetallic mineral processing plant, as defined in 40 CFR 60.671.
- (d) The requirements of the New Source Performance Standard for Calciners and Dryers in Mineral Industries, 40 CFR 60, Subpart UUU (326 IAC 12), are not included in the permit, since the source does not perform calcining and drying of raw materials prior to firing the brick. The basic and rotary dryers are used to dry wet mixed product that has been formed into shapes or recycled wet product.
- (e) There are no other New Source Performance Standards (NSPS) (326 IAC 12 and 40 CFR Part 60) included in the permit.

National Emission Standards for Hazardous Air Pollutants (NESHAP)

- (f) The requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Refractory Products Manufacturing, 40 CFR 63.6780, Subpart SSSSS (326 IAC 20-62), are not included in the permit, since this source is not, is not located at, and is not part of a major source of HAP emissions
- (g) There are no other National Emission Standards for Hazardous Air Pollutants (NESHAPs) (326 IAC 14, 326 IAC 20 and 40 CFR Part 63) applicable to this proposed revision.

Compliance Assurance Monitoring (CAM)

- (h) Pursuant to 40 CFR 64.2, Compliance Assurance Monitoring (CAM) is not included in the permit, because the potential to emit of the source is limited to less than the Title V major source thresholds and the source is not required to obtain a Part 70 or Part 71 permit.

State Rule Applicability - Entire Source

- (a) 326 IAC 1-6-3 (Preventive Maintenance Plan)
The source is subject to 326 IAC 1-6-3.
- (b) 326 IAC 1-7 (Stack Height Provisions)
Pursuant to 326 IAC 1-7, the source shall comply with 326 IAC 1-7-3 for all exhaust stacks through which a potential (before controls) of twenty-five (25) tons per year or more of particulate matter or sulfur dioxide is emitted.

- (c) 326 IAC 2-6 (Emission Reporting)
Although the source is located in Lake County, its emissions of VOC and/or NO_x are less than 25 tons per year, therefore the requirements of 326 IAC 2-6 (Emission Reporting) are not applicable and are not included in this permit.
- (d) 326 IAC 5-1 (Opacity Limitations)
Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:
 - (1) Opacity shall not exceed an average of twenty percent (20%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
 - (2) 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.
- (e) 326 IAC 6-4 (Fugitive Dust Emissions Limitations)
Pursuant to 326 IAC 6-4 (Fugitive Dust Emissions Limitations), the source 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.
- (f) 326 IAC 6.8-8 (Lake County: Continuous Compliance Plan)
The source is subject to the requirements of 326 IAC 6.8-8, because it is specifically listed in 326 IAC 6.8-8-1.
- (g) 326 IAC 6.8-9 (Lake County: PM₁₀ Coke Battery Emission Requirements)
The source is not subject to 326 IAC 6.8-9 because it does not include a coke battery.
- (h) 326 IAC 6.8-10 (Lake County: Fugitive Particulate Matter)
Although the source is located in Lake County, the potential fugitive particulate emissions are less than 5 tons per year. Therefore the requirements of 326 IAC 6.8-10 are not applicable and are not included in this permit.
- (i) 326 IAC 6.8-11 (Lake County: Particulate Contingency Measures)
This source is subject to the requirements of 326 IAC 6.8-11, because the source is specifically listed in 326 IAC 6.8-2-16, has fugitive emission sources to which 326 IAC 6.8-10-1(a) applies, and has potential PM₁₀ emissions greater than or equal to ten (10) tons per year.
- (j) 326 IAC 8-6 (Organic Solvent Emission Limitations)
Although the source was existing as of January 1, 1980 and is located in Lake County, the requirements of 326 IAC 8-6 are not applicable because the source does not have potential emissions of 90.7 megagrams (100 tons) or greater per year of VOC.
- (k) 326 IAC 8-7 (Specific VOC Reduction Requirements for Lake/Porter/Clark/Floyd Counties)
Although this source is located in Lake County, its potential to emit VOCs is less than twenty-five (25) tons per year and it does not have coating facilities which emit or have the potential to emit a total equal to or greater than ten (10) tons per year of VOCs. Therefore the requirements of 326 IAC 8-7 are not applicable and are not included in this permit.

Magnesite Processing / Mixing Department / Pressing Department / Rotary Dryer / Basic Dryer

- (l) 326 IAC 6.8-2-16 (Lake County: PM10 Emission Requirements - Resco Products, Inc.) Pursuant to 326 IAC 6.8-2-16, the PM10 emissions from the following emission units at Resco Products, Inc. shall not exceed the pounds per ton and pounds per hour emission limits below:

Unit Description / (Stack)	Unit Description as Specified in 326 IAC 6.8-2-16	Emissions Limits	
		(lbs/ton)	(lbs/hr)
Magnesite Unloading and Crushing PD-1/(D-1)	Magnesite Unloading and Crushing (D-1)	0.017	0.580
Magnesite Handling & Storage PD-2/(D-2)	Magnesite Material Handling and Storage (D-2)	0.012	0.410
Magnesite Classifying & Milling - East PD-8/(D-8)	Magnesite Screening and Milling (East) (D-8)	0.051	1.280
Batts Crushing & Screening PD-9/(D-9)	Bricks (Bats) Crushing (D-9)	0.024	0.490
Material Screening & Milling - West PD-11/(D-11)	Magnesite Handling and Storage (West) (D-11)	0.02	0.410
Material Screening & Milling - West PD-13/(D-13)	Magnesite Screening and Milling (West) (D-13)	0.044	0.700
DEV-22 Mixer PD-4/(D-4)	DEV-22 Mixer #5 (D-4)	0.033	0.230
RV-15 Mixers #1 and #2 PD-12B and PD-12C/(D-21)	3 Tilt Mixers #1, #2, and #3 (D-12B, D-12C, and D-12D)	0.054	0.460
RV-15 Mixer #3 PD-12D/(D-12D)			
DE-18 Flat Mixer PD-14/(D-14)	DE-18 Flat Mixer, Mixer #4 (D-14)	0.0165	0.230
Resin Bond Batch PD-12A/(D-12A)	Resin-Bonded Material Handling, Batching and Pressing (D-12A)	0.25	0.93
Rotary Dryer PD-10/(D-10)	Rotary Dryer (D-10)	0.032	0.640
Basic Dryer PS-8/(S-8)	Basic Dryer (Stack 8)	0.916	3.020

The following table shows emission units and their corresponding emission limits that are listed in 326 IAC 6.8-2-16, but that have been removed from the source.

Unit Description as Specified in 326 IAC 6.8-2-16	Emissions Limits	
	(lbs/ton)	(lbs/hr)
Each Stack Serving tunnel kiln numbers 1 (S-6) and 2 (S-3)	1.36	4.50
Each Stack Serving tunnel kiln numbers 1 (S-6) and 2 (S-3) -if only one kiln is in operation	1.36	8.40
Lanely Oven (S-7)	0.210	0.840
Simpson Mixer #3 (D-6)	0.033	0.230
Simpson Mixer #2 (D-5)	0.0165	0.230

Batching Department

- (m) 326 IAC 6.8 (Particulate Matter Emissions for Lake County) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Material Receiving Vessel Vent (PD-12E), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (n) 326 IAC 6.8 (Particulate Matter Emissions for Lake County) Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Graphite Transport (PD-19), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

- (o) 326 IAC 6.8 (Particulate Matter Emissions for Lake County)
Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Minor Additive Transport (PD-20), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (p) 326 IAC 6.8 (Particulate Matter Emissions for Lake County)
Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Batch Station Transport (PD-22), shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Montco Line

- (q) 326 IAC 6.8 (Particulate Matter Emissions for Lake County)
Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Montco Line, identified as S-30, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Bickley Periodic Elevator Kiln

- (r) 326 IAC 6.8 (Particulate Matter Emissions for Lake County)
Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Bickley Periodic Elevator Kiln, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Refractory Liquids System

- (s) 326 IAC 6.8 (Particulate Matter Emissions for Lake County)
Pursuant to 326 IAC 6.8-1-2(a), the particulate emissions from the Refractory Liquids System, identified as PS-31, shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).
- (t) 326 IAC 8-1-6 (New Facilities; General Reduction Requirements)
The Refractory Liquids System, identified as PS-31 is exempt from the requirements of 326 IAC 8-1-6 because it does not have potential VOC emissions greater than or equal to twenty-five (25) tons per year and is not otherwise regulated under other provisions of 326 IAC 8, 326 IAC 20-48, or 326 IAC 20-56.
- (u) 326 IAC 8-9 (Volatile Organic Liquid Storage Vessels)
Pursuant to 326 IAC 8-9-1(b), the six thousand (6,000) gallon methanol storage tank of the Refractory Liquids System (PS-31) is subject to the recordkeeping and reporting requirements of 326 IAC 8-9-6(a) and 326 IAC 8-9-6(b), because it is a stationary vessel used to store volatile organic liquid (VOL) that is located in Lake County, but has a storage capacity of less than thirty-nine thousand (39,000) gallons.

Compliance Determination and Monitoring Requirements

Permits issued under 326 IAC 2-8 are required to ensure that sources can demonstrate compliance with all applicable state and federal rules on a continuous basis. All state and federal rules contain compliance provisions, however, these provisions do not always fulfill the requirement for a continuous demonstration. When this occurs, IDEM, OAQ, in conjunction with the source, must develop specific conditions to satisfy 326 IAC 2-8-4. As a result, Compliance Determination Requirements are included in the permit. The Compliance Determination Requirements in Section D of the permit are those conditions that are found directly within state and federal rules and the violation of which serves as grounds for enforcement action.

If the Compliance Determination Requirements are not sufficient to demonstrate continuous compliance, they will be supplemented with Compliance Monitoring Requirements, also in Section D of the permit. Unlike Compliance Determination Requirements, failure to meet Compliance Monitoring conditions would serve as a trigger for corrective actions and not grounds for enforcement action. However, a violation in relation to a compliance monitoring condition will arise through a source's failure to take the appropriate corrective actions within a specific time period.

- (a) The compliance determination and monitoring requirements applicable to this source are as follows:

Stack ID	Parameter	Frequency	Range	Excursions and Exceedances
D-1	Visible Emissions	Daily	Normal - Abnormal	Response Steps
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-2	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-8	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-9	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-11	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-13	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-4	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	1.0 - 7.0 Inches	
D-21	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	1.0 - 7.0 Inches	
D-12D	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	1.0 - 7.0 Inches	
D-14	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	1.0 - 7.0 Inches	
D-12A	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
D-10	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
S-8	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	
S-30	Visible Emissions	Daily	Normal - Abnormal	
	Pressure Drop	Daily	2.0 - 8.0 Inches	

- (b) The testing requirements applicable to this source are as follows:

Emission Unit / Stack ID	Timeframe for Testing	Pollutant(s)	Frequency of Testing
Resin Bond Batch (PD-12A) / D-12A	Not later than five (5) years from the date of the last valid compliance demonstration	PM10	Once every five (5) years
Basic Dryer (PS-8) / S-8	Not later than five (5) years from the date of the last valid compliance demonstration	PM10	

Note: Testing was last performed for the Resin Bond Batch and Basic Dryer on April 16, 2009.

The source is subject to 326 IAC 6.8-4 because it is located in Lake County. Therefore, it must use the specified methods pertaining to opacity limits and testing conditions.

Conclusion and Recommendation

Unless otherwise stated, information 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 July 02, 2010.

The construction of emission units and continued operation of this source shall be subject to the conditions of the attached proposed FESOP Renewal No. 089-29427-00222. The staff recommends to the Commissioner that this FESOP Renewal be approved.

IDEM Contact

- (a) Questions regarding this proposed permit can be directed to Jason R. Krawczyk at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 232-8427 or toll free at 1-800-451-6027 extension 2-8427.
- (b) A copy of the findings is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>
- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM's Guide for Citizen Participation and Permit Guide on the Internet at: www.idem.in.gov

SUMMARY OF EMISSIONS

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Uncontrolled Emissions (Tons/Yr)																							
Pollutant	Nat. Gas Combustion	Magnesite Processing						Mixing Department				Batching Department				Pressing Department	Rotary Dryer	Basic Dryer	Montco Line	Bickley Periodic Elevator Kiln	Refractory Liquids System	Paved Roads (Fugitive)	Total
		PD-1	PD-2	PD-8	PD-9	PD-11	PD-13	PD-4	PD-12B PD-12C *	PD-12D *	PD-14	PD-12E	PD-19	PD-20	PD-22	PD-12A	PD-10	PS-8	PS-30		PS-31		
PM	0.14	744.60	15.93	931.41	770.88	0.16	596.10	10.79	11.17	22.34	10.79	0.24	0.08	0.01	0.18	267.36	148.92	17.24	9.90	1.85	5.78	1.17	3565.86
PM10	0.57	46.43	3.84	58.16	52.74	0.06	37.30	3.83	5.58	11.17	3.83	0.09	0.03	0.00	0.07	514.20	35.92	3.74	3.46	2.22	2.05	0.23	785.27
PM2.5	0.57	46.43	3.84	58.16	52.74	0.06	37.30	3.83	5.58	11.17	3.83	0.09	0.03	0.00	0.07	514.20	35.92	3.74	3.46	2.22	2.05	0.06	785.27
VOC	0.41	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.45	0.50	-	-	1.89	0.06	-	5.31
NOx	7.45	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.29	-	-	10.07	-	-	23.80
SO2	0.04	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	12.03	-	-	1.23	-	-	13.30
CO	6.25	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	21.55	-	-	9.83	-	-	37.63
Single HAP (Hexane)	0.13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.17	-	-	0.30
Combined HAPs	0.14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.07	-	-	0.17	0.06	-	0.44

Controlled Emissions (Tons/Yr)																							
Pollutant	Nat. Gas Combustion	Magnesite Processing						Mixing Department				Batching Department				Pressing Department	Rotary Dryer	Basic Dryer	Montco Line	Bickley Periodic Elevator Kiln	Refractory Liquids System	Paved Roads (Fugitive)	Total
		PD-1	PD-2	PD-8	PD-9	PD-11	PD-13	PD-4	PD-12B PD-12C *	PD-12D *	PD-14	PD-12E	PD-19	PD-20	PD-22	PD-12A	PD-10	PS-8	PS-30		PS-31		
PM	0.14	3.80	0.08	4.75	3.93	0.00	3.04	0.06	0.11	0.06	0.06	0.00	0.00	0.00	0.00	1.36	0.76	17.24	0.05	1.85	0.03	1.17	37.32
PM10	0.57	0.28	0.03	0.38	0.35	0.00	0.25	0.02	0.07	0.04	0.03	0.00	0.00	0.00	0.00	0.72	0.24	3.74	0.02	2.22	0.01	0.23	8.96
PM2.5	0.57	0.28	0.03	0.38	0.35	0.00	0.25	0.02	0.07	0.04	0.03	0.00	0.00	0.00	0.00	0.72	0.24	3.74	0.02	2.22	0.01	0.06	8.96
VOC	0.41	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.45	0.50	-	-	1.89	0.06	-	5.31
NOx	7.45	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.29	-	-	10.07	-	-	23.80
SO2	0.04	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	12.03	-	-	1.23	-	-	13.30
CO	6.25	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	21.55	-	-	9.83	-	-	37.63
Single HAP (Hexane)	0.13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.17	-	-	0.30
Combined HAPs	0.14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.07	-	-	0.17	0.06	-	0.44

Limited Emissions (Tons/Yr)																							
Pollutant	Nat. Gas Combustion	Magnesite Processing						Mixing Department				Batching Department				Pressing Department	Rotary Dryer	Basic Dryer	Montco Line	Bickley Periodic Elevator Kiln	Refractory Liquids System	Paved Roads (Fugitive)	Total
		PD-1	PD-2	PD-8	PD-9	PD-11	PD-13	PD-4	PD-12B PD-12C *	PD-12D *	PD-14	PD-12E	PD-19	PD-20	PD-22	PD-12A	PD-10	PS-8	PS-30		PS-31		
PM	0.14	37.23	1.80	46.56	38.54	1.80	29.78	1.01	1.34	0.67	1.01	0.24	0.08	0.01	0.18	4.07	2.80	17.24	9.90	1.85	5.78	1.17	202.03
PM10	0.57	2.54	1.80	5.61	2.15	1.80	3.07	1.01	2.01	1.01	1.01	0.09	0.03	0.00	0.07	4.07	2.80	13.23	3.51	2.22	2.05	0.23	49.62
PM2.5	0.57	2.54	1.80	5.61	2.15	1.80	3.07	1.01	1.34	0.67	1.01	0.09	0.03	0.00	0.07	4.07	2.80	3.74	3.46	2.22	2.05	0.06	40.08
VOC	0.41	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.45	0.50	-	-	1.89	0.06	-	5.31
NOx	7.45	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.29	-	-	10.07	-	-	23.80
SO2	0.04	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	12.03	-	-	1.23	-	-	13.30
CO	6.25	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	21.55	-	-	9.83	-	-	37.63
Single HAP (Hexane)	0.13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.17	-	-	0.30
Combined HAPs	0.14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.07	-	-	0.17	0.06	-	0.44

Note:

* Mixers #1, #2, and #3, identified as PD-12B, PD-12C, and PD-12D have combined PM10 emission limits under 326 IAC 6.8-2-16 of 0.54 lb/ton and 0.46 lb/hr. Therefore the Limited Emissions (Tons/Yr) for PM10 are determined by: 0.46 lb/hr * 8,760 hrs / 2,000 lbs
 * PM and PM2.5 emissions for PD-12B, PD-12C, and PD-12D are limited to 0.153 lbs/hr, each.
 Fugitive emissions are not counted toward the determination of PSD, Emission Offset, and Part 70 Permit applicability.

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

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Heat Input Capacity	Potential Throughput	Emission Units
MMBtu/hr	MMCF/yr	Basic Dryer (S-8)
13.50	118.26	Rotary Dryer (D-10)
3.50	30.66	
17.00	148.9	

Emission Factor in lb/MMCF	Pollutant					
	PM*	PM10*	SO2	NOx	VOC	CO
	1.9	7.6	0.6	100	5.5	84
				**see below		
Potential Emission in tons/yr	0.14	0.57	0.04	7.45	0.41	6.25

*PM emission factor is filterable PM only. PM10 emission factor is filterable and condensable PM10 combined.

**Emission Factors for NOx: Uncontrolled = 100, Low NOx Burner = 50, Low NOx Burners/Flue gas recirculation = 32

***CO emissions from the Rx Gas-Fired Mesh Belt Furnace are estimated on the Rx Gas-Fired Furnace Spreadsheet

Methodology:

All emission factors are based on normal firing.

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Emission Factors are from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, 1.4-3, SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03

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

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

See page 3 for HAPs emissions calculations.

**Appendix A: Emissions Calculations
Natural Gas Combustion Only
HAPs Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

HAPs - Organics					
Emission Factor in lb/MMcf	Benzene 2.1E-03	Dichlorobenzene 1.2E-03	Formaldehyde 7.5E-02	Hexane 1.8E+00	Toluene 3.4E-03
Potential Emission in tons/yr	1.564E-04	8.935E-05	5.585E-03	1.340E-01	2.532E-04

HAPs - Metals					
Emission Factor in lb/MMcf	Lead 5.0E-04	Cadmium 1.1E-03	Chromium 1.4E-03	Manganese 3.8E-04	Nickel 2.1E-03
Potential Emission in tons/yr	3.723E-05	8.191E-05	1.042E-04	2.829E-05	1.564E-04

Methodology is the same as page 2.

The five highest organic and metal HAPs emission factors are provided above.
 Additional HAPs emission factors are available in AP-42, Chapter 1.4.

**Appendix A: Emissions Calculations
Magnesite Processing Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Process PD-1

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Unloading and Crushing (D-1)	20	8.5	99.49%	170.00	744.60	0.87	3.80
				744.60		3.80	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Unloading and Crushing (D-1)	20	0.53	99.39%	10.6	46.43	0.06	0.28
				46.43		0.28	

Note:

Magnesite Unloading and Crushing emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-003-02 (Brick Manufacture Raw Material Grinding and Screening)

Process PD-2

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Handling & Storage (Material Screening) (D-2)	12	0.3	99.49%	3.60	15.768	0.02	0.08
Magnesite Handling & Storage (Material Storage) (D-2)	12	0.003	99.49%	0.04	0.16	0.00	0.00
				15.93		0.08	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Handling & Storage (Material Screening) (D-2)	12	0.072	99.34%	0.864	3.78	0.01	0.02
Magnesite Handling & Storage (Material Storage) (D-2)	12	0.0011	99.34%	0.0132	0.06	0.00	0.00
				3.84		0.03	

Note:

Magnesite Screening emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-21 (Stone Quarrying - Processing Fines Screening)

Magnesite Storage emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Process PD-8

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Classifying & Milling - East (Grinding) (D-8)	25	8.5	99.49%	212.50	930.75	1.08	4.75
Magnesite Classifying & Milling - East (Storage) (D-8)	25	0.003	99.49%	0.08	0.33	0.00	0.00
Magnesite Classifying & Milling - East (Screening) (D-8)	25	0.003	99.49%	0.08	0.33	0.00	0.00
				931.41		4.75	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Magnesite Classifying & Milling - East (Grinding) (D-8)	25	0.53	99.34%	13.25	58.04	0.09	0.38
Magnesite Classifying & Milling - East (Storage) (D-8)	25	0.0011	99.34%	0.03	0.12	0.00	0.00
Magnesite Classifying & Milling - East (Screening) (D-8)	25	0.0011	99.34%	0.03	0.12	0.00	0.00
				58.16		0.38	

Note:

Magnesite Grinding emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-003-02 (Brick Manufacture Raw Material Grinding and Screening)

Magnesite Storage emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Magnesite Screening emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)

Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs

Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))

Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

**Appendix A: Emissions Calculations
Magnesite Processing Emissions (Continued)**

Process PD-9

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Batts Crushing & Screening (Screening) (D-9)	20	0.3	99.49%	6.00	26.28	0.03	0.13
Batts Crushing & Screening (Crushing) (D-9)	20	8.5	99.49%	170.00	744.60	0.87	3.80
					770.88		3.93

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Batts Crushing & Screening (Screening) (D-9)	20	0.072	99.34%	1.44	6.31	0.01	0.04
Batts Crushing & Screening (Crushing) (D-9)	20	0.53	99.34%	10.6	46.43	0.07	0.31
					52.74		0.35

Note:

Batts Screening emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-21 (Stone Quarrying - Processing Fines Screening)
Batts Crushing emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-003-02 (Brick Manufacture Raw Material Grinding and Screening)

Process PD-11

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Screening & Milling - West (D-11)	12	0.003	99.49%	0.04	0.16	0.00	0.00
					0.16		0.00

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Screening & Milling - West (D-11)	12	0.0011	99.39%	0.0132	0.06	0.00	0.00
					0.06		0.00

Note:

Material Screening & Milling emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Process PD-13

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Screening & Milling - West (Grinding) (D-13)	16	8.5	99.49%	136.00	595.68	0.69	3.04
Material Screening & Milling - West (Storage) (D-13)	16	0.003	99.49%	0.05	0.21	0.00	0.00
Material Screening & Milling - West (Screening) (D-13)	16	0.003	99.49%	0.05	0.21	0.00	0.00
					596.10		3.04

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Screening & Milling - West (Grinding) (D-13)	16	0.53	99.34%	8.48	37.14	0.06	0.25
Material Screening & Milling - West (Storage) (D-13)	16	0.0011	99.34%	0.02	0.08	0.00	0.00
Material Screening & Milling - West (Screening) (D-13)	16	0.0011	99.34%	0.02	0.08	0.00	0.00
					37.30		0.25

Note:

Material Grinding emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-003-02 (Brick Manufacture Raw Material Grinding and Screening)
Material Storage emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)
Material Screening emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)
Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs
Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))
Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

Appendix A: Emissions Calculations
Mixing Department Emissions

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Process PD-4

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
DEV-22 Mixer (D-4)	11.2	0.22	99.49%	2.46	10.79	0.01	0.06
				10.79		0.06	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
DEV-22 Mixer (D-4)	11.2	0.078	99.39%	0.8736	3.83	0.01	0.02
				3.83		0.02	

Note:

DEV-22 Mixer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-011-09 (Concrete Batching Mixer Loading of Cement/Sand/Aggregate)

Process PD-12B / PD12C

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
RV-15 Mixer #1 (D-21)	4.25	0.6	99.49%	2.55	11.169	0.01	0.06
RV-15 Mixer #2 (D-21)	4.25	0.6	99.49%	2.55	11.17	0.01	0.06
				22.34		0.11	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
RV-15 Mixer #1 (D-21)	4.25	0.3	99.34%	1.275	5.58	0.01	0.04
RV-15 Mixer #2 (D-21)	4.25	0.3	99.34%	1.275	5.58	0.01	0.04
				11.17		0.07	

Note:

RV-15 Mixer #1 & #2 emission factors from USEPA WebFIRE version 6.25 for SCC 3-05-012-23 (Fiberglass Manufacturing Raw Material: Mixing/Weighing)

Process PD-12D

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
RV-15 Mixer #3 (D-12D)	4.25	0.6	99.49%	2.55	11.169	0.01	0.06
				11.17		0.06	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
RV-15 Mixer #3 (D-12D)	4.25	0.3	99.34%	1.275	5.58	0.01	0.04
				5.58		0.04	

Note:

RV-15 Mixer #3 emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-012-23 (Fiberglass Manufacturing Raw Material: Mixing/Weighing)

Process PD-14

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
DE-18 Flat Mixer (D-14)	11.2	0.22	99.49%	2.46	10.79232	0.01	0.06
				10.79		0.06	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
DE-18 Flat Mixer (D-14)	11.2	0.078	99.34%	0.87	3.83	0.01	0.03
				3.83		0.03	

Note:

DE-18 Flat Mixer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-011-09 (Concrete Batching Mixer Loading of Cement/Sand/Aggregate)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)
 Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs
 Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))
 Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

**Appendix A: Emissions Calculations
Batching Department Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Pit ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Process PD-12E

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Receiving Vessel Vent (Material Transfer) (D-12E)	18	0.003	99.49%	0.05	0.24	0.00	0.00
				0.24		0.00	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Material Receiving Vessel Vent (Material Transfer) (D-12E)	18	0.0011	99.39%	0.0198	0.09	0.00	0.00
				0.09		0.00	

Note:
Material Receiving Vessel Vent emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Process PD-19

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Graphite Transfer (D-19)	6	0.003	99.49%	0.02	0.07884	0.00	0.00
				0.08		0.00	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Graphite Transfer (D-19)	6	0.0011	99.34%	0.0066	0.03	0.00	0.00
				0.03		0.00	

Note:
Graphite Transfer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Process PD-20

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Minor Additive Transport (D-20)	0.75	0.003	99.49%	0.00	0.009855	0.00	0.00
				0.01		0.00	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Minor Additive Transport (D-20)	0.75	0.0011	99.34%	0.00	0.00	0.00	0.00
				0.00		0.00	

Note:
Minor Additive Transfer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Process PD-22

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Batch Station Transport (D-22)	14	0.003	99.49%	0.04	0.18396	0.00	0.00
				0.18		0.00	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Batch Station Transport (D-22)	14	0.0011	99.34%	0.0154	0.07	0.00	0.00
				0.07		0.00	

Note:
Batch Station Transfer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)
Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs
Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))
Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

**Appendix A: Emissions Calculations
Pressing Department Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Process PD-12A

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Resin Bond Batch (Batching/Material Transfer) (D-12A)	10.9	5.6	99.49%	61.04	267.36	0.31	1.36
				267.36		1.36	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Resin Bond Batch (Batching/Material Transfer) (D-12A)	10.9	0.015	99.39%	117.40	514.20	0.16	0.72
				514.20		0.72	

Note:

PM emission factor (Before Control) from stack testing performed November 13, 2008.

PM10 emission factor (After Control) from stack testing performed April 16, 2009.

Assumed PM10 = PM2.5

Methodology:

PM Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)

PM Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs

PM Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))

PM Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

PM10/PM2.5 Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) / (1 - Control Efficiency (%))

PM10/PM2.5 Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs

PM10/PM2.5 Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)

PM10/PM2.5 Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

**Appendix A: Emissions Calculations
Rotary Dryer (PD-10)**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

1. Process Emissions

Maximum Throughput
(tons/hr)

Rotary Dryer (PD-10)

20.00

	Before Controls			After Controls		
	PM	PM10	VOC	PM	PM10	VOC
Emission Factor in lb/ton	1.70	0.41	0.03	NA	NA	NA
Potential Emissions in lbs/hr	34.00	8.20	0.56	0.17	0.05	0.56
Potential Emission in tons/yr	148.92	35.92	2.45	0.76	0.24	2.45

Note:

PM & PM10 emission factors from AP-42 Chapter 11.5, Table 11.5-5 (SCC 3-05-005-08).
 PM Control Efficiency = 99.49%
 PM10 Control Efficiency = 99.34%
 VOC Emissions are Uncontrolled.

Methodology:

Before Controls Potential Emissions in lbs/hr = Maximum Throughput (tons/hr) * Emission Factor in lb/ton.
 Before Controls Potential Emissions in tons/yr = Maximum Throughput (tons/hr) * Emission Factor in lb/ton * 8,760 hrs / 2,000 lbs.
 PM After Controls Potential Emissions in lbs/hr = Before Controls Potential Emissions in lbs/hr * (1 - 99.49%)
 PM10 After Controls Potential Emissions in lbs/hr = Before Controls Potential Emissions in lbs/hr * (1 - 99.34%)
 VOC After Controls Potential Emissions in lb/hr = Before Controls Potential Emissions in lbs/hr
 After Controls Potential Emissions in tons/yr = After Controls Potential Emissions in lbs/hr * 8,760 / 2,000 lbs.

2. Combustion Emissions

Combustion Emissions for PS-8 are found on Pages 2 and 3 of TSD App A.

**Appendix A: Emissions Calculations
Basic Dryer (PS-8)**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

1. Process Emissions

Maximum Throughput
(tons/hr)

Basic Dryer (PS-8)

4.10

Emission Factor in lb/ton	Pollutant					
	PM	PM10*	SO2	NOx	VOC	CO
Potential Emissions in lbs/hr	3.94	0.85	2.75	1.44	0.11	4.92
Potential Emission in tons/yr	17.24	3.74	12.03	6.29	0.50	21.55
Emission Factor in lb/ton	HAPs - Organics					
	Benzene	Dichlorobenzene	Ethylbenzene	Napthalene	Toluene	Xylenes
Potential Emissions in lbs/hr	0.01	0.00	0.00	0.00	0.00	0.00
Potential Emission in tons/yr	5.21E-02	8.62E-04	7.90E-04	1.17E-03	2.87E-03	1.04E-03
Emission Factor in lb/ton	HAPs-Metals					
	Lead	Cadmium	Chromium	Manganese	Nickel	Cobalt
Potential Emissions in lbs/hr	0.00	0.00	0.00	0.00	0.00	0.00
Potential Emission in tons/yr	2.69E-03	2.69E-04	9.16E-04	5.21E-03	1.29E-03	3.77E-05

Notes:

PM, SO2, NOx, VOC, CO, and HAP emission factors from WebFIRE factors for Brick Manufacture, Curing and Firing: Gas-fired Tunnel Kilns (SCC 3-05-003-11).

*PM10 Emission factor from stack testing performed April 16, 2009.

Assumed PM10 = PM2.5

Methodology:

Potential Emissions in lbs/hr = Maximum Throughput (lbs/hr) * Emission Factor in lb/ton.

Potential Emissions in tons/yr = Maximum Throughput (lbs/hr) * Emission Factor in lb/ton * 8,760 hrs / 2,000 lbs.

2. Combustion Emissions

Combustion Emissions for PS-8 are found on Pages 2 and 3 of TSD App A.

**Appendix A: Emissions Calculations
Montco Line Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Process PS-30

Processes (Stack)	Process Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Montco Line (Pre-Batch)(S-30)	10	0.003	99.49%	0.03	0.1314	0.00	0.00
Montco Line (Mixing)(S-30)	10	0.22	99.49%	2.20	9.64	0.01	0.05
Montco Line (Packaging)(S-30)	10	0.003	99.49%	0.03	0.13	0.00	0.00
				9.90		0.05	

Processes (Stack)	Process Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)	(lb/ton)	(%)	(lb/hr)	(ton/yr)	(lb/hr)	(ton/yr)
Montco Line (Pre-Batch)(S-30)	10	0.0011	99.34%	0.01	0.05	0.00	0.00
Montco Line (Mixing)(S-30)	10	0.078	99.34%	0.78	3.42	0.01	0.02
Montco Line (Packaging)(S-30)	10	0.0011	99.34%	0.01	0.05	0.00	0.00
				3.46		0.02	

Note:

Montco Line (Pre-Batch) emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)
 Montco Line (Mixing) emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-011-09 (Concrete Batching Mixer Loading of Cement/Sand/Aggregate)
 Montco Line (Packaging) emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-020-06 (Stone Quarrying - Processing Miscellaneous Operations)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)
 Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs
 Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))
 Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

**Appendix A: Emissions Calculations
Bickley Periodic Elevator Kiln Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Pit ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

1. Process Emissions

Maximum Throughput (tons/yr) **3500** Maximum Throughput (lb/hr) **0.40**

Emission Factor in lb/ton	Pollutant					
	PM	PM10	SO2	NOx	VOC	CO
Potential Emissions in lbs/hr	0.38	0.35	0.27	0.20	0.32	0.48
Potential Emission in tons/yr	1.68	1.52	1.17	0.88	1.38	2.10

PM, PM10, SO2, VOC, and CO emission factors submitted by source for Administrative Amendment. Emission Factors are greater than WebFIRE factors for Brick Manufacture, Curing and Firing: Gas-fired Periodic Kilns (SCC 3-05-003-14).

NOx emission factor submitted by source is lower than the one found in WebFIRE. The WebFIRE emission factor for SCC 3-05-003-14 was used as a worst case scenario.

Methodology:

Potential Emissions in lbs/hr = Maximum Throughput (lbs/hr) * Emission Factor in lb/ton.

Potential Emissions in tons/yr = Maximum Throughput (lbs/hr) * Emission Factor in lb/ton * 8,760 hrs / 2,000 lbs.

2. Combustion Emissions

Heat Input Capacity (MMBtu/hr) **21.00** Potential Throughput (MMCF/yr) **183.96**

Emission Factor in lb/MMCF	Pollutant					
	PM*	PM10*	SO2	NOx	VOC	CO
Potential Emission in tons/yr	0.17	0.70	0.06	9.20	0.51	7.73

*PM emission factor is filterable PM only. PM10 emission factor is filterable and condensable PM10 combined.

**Emission Factors for NOx: Uncontrolled = 100, Low NOx Burner = 50, Low NOx Burners/Flue gas recirculation = 32

Emission Factor in lb/MMcf	HAPs - Organics				
	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene
Potential Emission in tons/yr	1.932E-04	1.104E-04	6.899E-03	1.656E-01	3.127E-04

Emission Factor in lb/MMcf	HAPs - Metals				
	Lead	Cadmium	Chromium	Manganese	Nickel
Potential Emission in tons/yr	4.599E-05	1.012E-04	1.288E-04	3.495E-05	1.932E-04

Methodology:

All emission factors are based on normal firing.

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Emission Factors are from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, 1.4-3, SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03

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

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

The five highest organic and metal HAPs emission factors are provided above.

Additional HAPs emission factors are available in AP-42, Chapter 1.4.

**Appendix A: Emissions Calculations
Refractory Liquid System (PS-31) Emissions**

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

1. Particulate Emissions

Process PS-31

Processes (Stack)	Throughput	PM Emission Factor	Control Efficiency	PM Emissions Before Control		PM Emissions After Control	
	(tons/hr)			(lb/ton)	(lb/hr)	(ton/yr)	(lb/hr)
Raw Material Loading (D-31)	3	0.22	99.50%	0.66	2.89	0.00	0.01
Mixing (D-31)	3	0.22	99.50%	0.66	2.89	0.00	0.01
				5.78		0.03	

Processes (Stack)	Throughput	PM10/PM2.5 Emission Factor	Control Efficiency	PM10/PM2.5 Emissions Before Control		PM10/PM2.5 Emissions After Control	
	(tons/hr)			(lb/ton)	(lb/hr)	(ton/yr)	(lb/hr)
Raw Material Loading (D-31)	3	0.078	99.50%	0.234	1.02	0.00	0.01
Mixing (D-31)	3	0.078	99.50%	0.234	1.02	0.00	0.01
				2.05		0.01	

Note:

Raw Material Loading emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-011-09 (Concrete Batching Mixer Loading of Cement/Sand/Aggregate)
Mixer emission factor from USEPA WebFIRE version 6.25 for SCC 3-05-011-09 (Concrete Batching Mixer Loading of Cement/Sand/Aggregate)

Methodology:

Emissions Before Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton)
Emissions Before Control (ton/yr) = Emissions Before Control (lb/hr) * 8,760 hrs / 2,000 lbs
Emissions After Control (lb/hr) = Process Throughput (tons/hr) * Emission Factor (lb/ton) * (1 - Control Efficiency (%))
Emissions After Control (ton/yr) = Emissions After Control (lb/hr) * 8,760 hrs / 2,000 lbs

2. VOC & HAP Emissions

Tank ID	Potential Emissions		Potential VOC Emissions	Potential HAP Emissions
	(lb/yr)	(tons/yr)		
Methanol Storage Tank	119	1.36E-02	0.06	0.06

Emissions were calculated using Tanks 4.0.9d software and submitted by the source.

Appendix A: Emission Calculations
Fugitive Dust Emissions - Paved Roads

Company Name: Resco Products, Inc.
Address City IN Zip: 5501 Kennedy Avenue, Hammond, IN 46323
Permit Number: 089-29427-00222
Plt ID: 089-00222
Reviewer: Jason R. Krawczyk
Date: February 14, 2011

Paved Roads at Industrial Site

The following calculations determine the amount of emissions created by paved roads, based on 8,760 hours of use and AP-42, Ch 13.2.1 (1/2011).

Vehicle Information (provided by source)

Type	Maximum number of vehicles	Number of one-way trips per day per vehicle	Maximum trips per day (trip/day)	Maximum Weight Loaded (tons/trip)	Total Weight driven per day (ton/day)	Maximum one-way distance (feet/trip)	Maximum one-way distance (mi/trip)	Maximum one-way miles (miles/day)	Maximum one-way miles (miles/yr)
Vehicle Type I (entering plant) (one-way)	40.0	1.0	40.0	39.5	1580.0	1400	0.265	10.6	3871.2
Vehicle Type I (leaving plant) (one-way t	40.0	1.0	40.0	39.5	1580.0	1400	0.265	10.6	3871.2
Vehicle Type II (entering plant)	5.0	1.0	5.0	39.5	197.5	1400	0.265	1.3	483.9
Vehicle Type II (leaving plant)	5.0	1.0	5.0	39.5	197.5	1400	0.265	1.3	483.9
Total			90.0		3555.0			23.9	8710.2

Average Vehicle Weight Per Trip = $\frac{39.5}{1}$ tons/trip
 Average Miles Per Trip = $\frac{0.27}{1}$ miles/trip

Unmitigated Emission Factor, $E_f = k * (sL)^{0.91} * (W)^{1.02}$ (Equation 1 from AP-42 13.2.1)

	PM	PM10	PM2.5	
where k =	0.011	0.0022	0.00054	lb/VMt = particle size multiplier (AP-42 Table 13.2.1-1)
W =	39.5	39.5	39.5	tons = average vehicle weight (provided by source)
sL =	0.6	0.6	0.6	g/m ² = Ubiquitous Baseline Silt Loading Values of paved roads (Table 13.2.1-2 for Low Volume Roads - ADT Category <500)

Taking natural mitigation due to precipitation into consideration, Mitigated Emission Factor, $E_{ext} = E * [1 - (p/4N)]$

Mitigated Emission Factor, $E_{ext} = E_f * [1 - (p/4N)]$
 where p = $\frac{125}{365}$ days of rain greater than or equal to 0.01 inches (see Fig. 13.2.1-2)
 N = 365 days per year

	PM	PM10	PM2.5	
Unmitigated Emission Factor, $E_f =$	0.29	0.06	0.01	lb/mile
Mitigated Emission Factor, $E_{ext} =$	0.27	0.05	0.01	lb/mile
Dust Control Efficiency =	0%	0%	0%	

Process	Unmitigated PTE of PM (tons/yr)	Unmitigated PTE of PM10 (tons/yr)	Unmitigated PTE of PM2.5 (tons/yr)	Mitigated PTE of PM (tons/yr)	Mitigated PTE of PM10 (tons/yr)	Mitigated PTE of PM2.5 (tons/yr)	Controlled PTE of PM (tons/yr)	Controlled PTE of PM10 (tons/yr)	Controlled PTE of PM2.5 (tons/yr)
Vehicle Type I (entering plant) (one-way	0.57	0.11	0.03	0.52	0.10	0.03	0.52	0.10	0.03
Vehicle Type I (leaving plant) (one-way t	0.57	0.11	0.03	0.52	0.10	0.03	0.52	0.10	0.03
Vehicle Type II (entering plant)	0.07	0.01	0.00	0.06	0.01	0.00	0.06	0.01	0.00
Vehicle Type II (leaving plant)	0.07	0.01	0.00	0.06	0.01	0.00	0.06	0.01	0.00
	1.28	0.26	0.06	1.17	0.23	0.06	1.17	0.23	0.06

Methodology:

Total Weight driven per day (ton/day) = [Maximum Weight Loaded (tons/trip)] * [Maximum trips per day (trip/day)]
 Maximum one-way distance (mi/trip) = [Maximum one-way distance (feet/trip) / 5280 ft/mile]
 Maximum one-way miles (miles/day) = [Maximum trips per year (trip/day)] * [Maximum one-way distance (mi/trip)]
 Average Vehicle Weight Per Trip (ton/trip) = SUM[Total Weight driven per day (ton/day)] / SUM[Maximum trips per day (trip/day)]
 Average Miles Per Trip (miles/trip) = SUM[Maximum one-way miles (miles/day)] / SUM[Maximum trips per year (trip/day)]
 Unmitigated PTE (tons/yr) = [Maximum one-way miles (miles/yr)] * [Unmitigated Emission Factor (lb/mile)] * (ton/2000 lbs)
 Mitigated PTE (tons/yr) = [Maximum one-way miles (miles/yr)] * [Mitigated Emission Factor (lb/mile)] * (ton/2000 lbs)
 Controlled PTE (tons/yr) = [Mitigated PTE (tons/yr)] * [1 - Dust Control Efficiency]

Abbreviations:

PM = Particulate Matter
 PM10 = Particulate Matter (<10 um)
 PM2.5 = Particle Matter (<2.5 um)
 PTE = Potential to Emit



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

Mitchell E. Daniels Jr.
Governor

Thomas W. Easterly
Commissioner

100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

SENT VIA U.S. MAIL: CONFIRMED DELIVERY AND SIGNATURE REQUESTED

TO: Robert Williamson
Resco Products
5501 Kennedy Ave
Hammond, IN 46323

DATE: April 5, 2011

FROM: Matt Stuckey, Branch Chief
Permits Branch
Office of Air Quality

SUBJECT: Final Decision
FESOP - Renewal
089 - 29427 - 00222

Enclosed is the final decision and supporting materials for the air permit application referenced above. Please note that this packet contains the original, signed, permit documents.

The final decision is being sent to you because our records indicate that you are the contact person for this application. However, if you are not the appropriate person within your company to receive this document, please forward it to the correct person.

A copy of the final decision and supporting materials has also been sent via standard mail to:
Caroline Adams Providence Environmental Partners
OAQ Permits Branch Interested Parties List

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178, or toll-free at 1-800-451-6027 (ext. 3-0178), and ask to speak to the permit reviewer who prepared the permit. If you think you have received this document in error, please contact Joanne Smiddie-Brush of my staff at 1-800-451-6027 (ext 3-0185), or via e-mail at jbrush@idem.IN.gov.

Final Applicant Cover letter.dot 11/30/07



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

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Thomas W. Easterly
Commissioner

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Toll Free (800) 451-6027
www.idem.IN.gov

April 5, 2011

TO: Hammond Public Library

From: Matthew Stuckey, Branch Chief
Permits Branch
Office of Air Quality

Subject: **Important Information for Display Regarding a Final Determination**

Applicant Name: Resco Products
Permit Number: 089 - 29427 - 00222

You previously received information to make available to the public during the public comment period of a draft permit. Enclosed is a copy of the final decision and supporting materials for the same project. Please place the enclosed information along with the information you previously received. To ensure that your patrons have ample opportunity to review the enclosed permit, **we ask that you retain this document for at least 60 days.**

The applicant is responsible for placing a copy of the application in your library. If the permit application is not on file, or if you have any questions concerning this public review process, please contact Joanne Smiddie-Brush, OAQ Permits Administration Section at 1-800-451-6027, extension 3-0185.

Enclosures
Final Library.dot 11/30/07

Mail Code 61-53

IDEM Staff	LPOGOST 4/5/2011 Resco Products 089 - 29427 - 00222 final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING	
Name and address of Sender		Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

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3		Gary - Hobart Water Corp 650 Madison St, P.O. Box M486 Gary IN 46401-0486 (Affected Party)									
4		Lake County Health Department-Gary 1145 W. 5th Ave Gary IN 46402-1795 (Health Department)									
5		WJOB / WZVN Radio 6405 Olcott Ave Hammond IN 46320 (Affected Party)									
6		Hammond City Council and Mayors Office 5925 Calumet Avenue Hammond IN 46320 (Local Official)									
7		Hammond Public Library 564 State St Hammond IN 46320-1532 (Library)									
8		Laurence A. McHugh Barnes & Thornburg 100 North Michigan South Bend IN 46601-1632 (Affected Party)									
9		Shawn Sobocinski 3229 E. Atlanta Court Portage IN 46368 (Affected Party)									
10		Ms. Carolyn Marsh Lake Michigan Calumet Advisory Council 1804 Oliver St Whiting IN 46394-1725 (Affected Party)									
11		Mark Coleman 9 Locust Place Ogden Dunes IN 46368 (Affected Party)									
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13		Craig Hogarth 7901 West Morris Street Indianapolis IN 46231 (Affected Party)									
14		Lake County Commissioners 2293 N. Main St, Building A 3rd Floor Crown Point IN 46307 (Local Official)									
15		Anthony Copeland 2006 E. 140th Street East Chicago IN 46312 (Affected Party)									

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2		Mr. Robert Garcia 3733 Parrish Avenue East Chicago IN 46312 (Affected Party)										
3		Ms. Karen Kroczek 8212 Madison Ave Munster IN 46321-1627 (Affected Party)										
4		Calumet Township Trustee 31 E 5th Avenue Gary IN 46402 (Affected Party)										
5		Joseph Hero 11723 S Oakridge Drive St. John IN 46373 (Affected Party)										
6		Gary City Council 401 Broadway # 209 Gary IN 46402 (Local Official)										
7		Ron Novak Hammond Dept. of Environmental Management 5925 Calumnet Ave. Hammond IN 46320 (Local Official)										
8		Mr. Larry Davis 268 South, 600 West Hebron IN 46341 (Affected Party)										
9		Caroline Adams Providence Environmental Partners, PLLC 1519 Myers Park Drive Charolette NC 28207 (Consultant)										
10		Gitte Laasby Post Tribune 1433 E. 83rd Ave Merrillville IN 46410 (Affected Party)										
11		Susan Severtson City of Gary Law Dept. 401 Broadway 4th Floor Gary IN 46402 (Local Official)										
12		Mark Zeltwanger 26545 CR 52 Nappanee IN 46550 (Affected Party)										
13												
14												
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