



DATE: August 13, 2008

TO: Interested Parties / Applicant

RE: American Art Clay Company, Incorporated / F097-26238-00514

FROM: Timothy J. Method
Environmental Coordinator
Department of Public Works

CERTIFIED MAIL 7008 0150003 5219 3394

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, Room 501, Indianapolis, IN 46204, **within fifteen (15) calendar days of the receipt 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 Indianapolis Office of Environmental Services, Air Permits at (317) 327-2234.

Enclosures



Air Quality Hotline: 317-327-4AIR | knozone.com

Department of Public Works
Office of Environmental Services

2700 Belmont Avenue
Indianapolis, IN 46221

317-327-2234
Fax 327-2274
TDD 327-5186
indygov.org/dpw



**Federally Enforceable State Operating Permit Renewal
INDIANA DEPARTMENT of ENVIRONMENTAL
MANAGEMENT
OFFICE OF AIR QUALITY
and OFFICE OF ENVIRONMENTAL SERVICES**

**American Art Clay Company, Incorporated
6060 North Guion Road
Indianapolis, Indiana 46254**

(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.: F097-26238-00514	
Issued by: ORIGINAL SIGNED BY Timothy J. Method Environmental Coordinator Department of Public Works	Issuance Date: August 13, 2008 Expiration Date: August 13, 2018



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**Department of Public Works
Office of Environmental Services**

2700 Belmont Avenue
Indianapolis, IN 46221

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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) and Office of Environmental Services (OES). 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 source manufacturing clay and assembling kilns and potter's wheels.

Source Address:	6060 North Guion Road, Indianapolis, Indiana 46254
Mailing Address:	6060 North Guion Road, Indianapolis, Indiana 46254
General Source Phone Number:	(317) 244-6871
SIC Code:	3269, 3479 & 3499
County Location:	Marion
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:

Clay Mixing and Fire Brick Cutting

Crude Clay Department:

- (a) One (1) clay mixing area identified as EU-03a, constructed in 2004, with a maximum capacity of 87,600 tons of dry crude clay per year, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21, and comprised of the following:
 - (1) Two (2) mixer-extruders; and
 - (2) One (1) crude clay bagger.
- (b) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03b (formerly part of EU-01) and mixing red clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per year; with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
- (c) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03c and mixing white clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per year, installed in 2004, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
- (d) Eight (8) crude clay storage silos, identified as EU-12, constructed in 2004, with a maximum capacity of 175,200 tons per year of crude clay, with particulate emissions controlled by five (5) vent filters, identified as IP-2 through IP-5 and IP-12 and exhausting through stacks S-5 through S-8 and S-25.

- (e) Three (3) in-use silos, identified as EU-13, constructed in 2004, with a maximum capacity of 87,600 tons per year of clay, with particulate emissions controlled by three (3) vent filters, identified as IP-7, IP-8, and IP-9 and exhausting through stacks S-10, S-11 and S-22.
- (f) One (1) scale/pneumatic blender system, identified as IA-12, constructed in 2004, with a maximum capacity of 87,600 tons per year of crude clay, with particulate emissions controlled by three (3) vent filters, identified as IP-6, IP-10 and IP-11, and exhausting through stacks S-9, S-23 and S-24.

Kiln Department:

- (g) One (1) fire brick cutting operation, identified as EU-06, constructed in 2004 and modified in 2007, with a maximum capacity of 100 pounds of fire brick per hour, with particulate emissions controlled by one (1) baghouse, identified as CE-4, exhausting to stack S-12, and comprised of the following:
 - (1) Five (5) fire brick cutters;
 - (2) One (1) CNC fire brick router;
 - (3) Two (2) fire brick shapers; and
 - (4) One (1) fire brick sander.

Surface Coating

- (h) One (1) kiln paint booth, identified as EU-07, constructed in 2004, with a maximum usage of 1.47 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-5, exhausting to stack S-13.
- (i) One (1) Brent paint booth, identified as EU-08, constructed in 2004, with a maximum usage of 4.32 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.
- (j) One (1) touch-up process for the Brent paint booth, identified as EU-08a, constructed in 2004, with a maximum usage of 1.12 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.

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:

Crude Clay Department:

- (a) One (1) mixing operation, identified as EU-04, comprised of one (1) sack dump blender, constructed in 2004, with a maximum capacity of 1,500 tons per year of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]
- (b) One (1) mixing operation, identified as EU-04d, comprised of one (1) sack dump blender, receiving approval to construct in 2008, with a maximum capacity of 300 pounds per hour of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

Other Insignificant Activities:

- (c) Natural gas-fired combustion sources with a heat input capacity of less than ten million (10,000,000) British thermal units per hour: [326 IAC 6.5]
 - (1) One (1) Weil natural gas-fired boiler, identified as EU-11, with a maximum capacity of 1.15 million British thermal units per hour, exhausting to stack S-17; and
 - (2) Fifteen space heaters, identified as IA-11, one with a capacity of 2.5 MMBtu/hr, two with a capacity of 0.75 MMBtu/hr and twelve with a capacity of 0.15 MMBtu/hr and all burning only natural gas.
- (d) The following equipment related to manufacturing activities not resulting in the emission of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment:
 - (1) One (1) welding operation, identified as IA-8, with a maximum capacity of 1,621 tons of steel per year and 6 tons of welding wire per year, exhausting to general ventilation. [326 IAC 6.5-1-2]
- (e) Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to 4,000 actual cubic feet per minute, including the following: deburring, buffing, polishing, abrasive blasting, pneumatic conveying, and woodworking operations:
 - (1) One (1) woodworking operation, identified as IA-7, with a maximum capacity of 136 tons per year, exhausting through dust collectors to general ventilation. [326 IAC 6.5-1-2]
- (f) Emission units with PM and PM-10 emissions less than five (5) tons per year, SO₂, NO_x, and VOC emissions less than ten (10) tons per year, CO emissions less than twenty-five (25) tons per year, lead emissions less than two-tenths (0.2) tons per year, single HAP emissions less than one (1) ton per year, and combination of HAPs emissions less than two and a half (2.5) tons per year:
 - (1) One (1) leaded glaze mixing area 1, identified as EU-01a, with a capacity of 800 tons of leaded glaze per year, particulate emissions controlled by a HEPA Filter identified as CE-10, and exhausting internally; [326 IAC 6.5-1-2]
 - (2) Three (3) unleaded glaze mixers in one area identified as EU-01b, with a combined maximum capacity of 2,400 tons of unleaded glaze per year, with particulate emissions controlled by one (1) baghouse identified as CE-1, exhausting to stack S-1; [326 IAC 6.5-1-2]
 - (3) One (1) Sculpt-a-Mold batch mixer, identified as EU-05, receiving approval to construct in 2003, with a maximum capacity of 915 tons of paper mache powder per year, controlled by one (1) cyclone/bagfilter and exhausting internally; [326 IAC 6.5-1-2]
 - (4) One (1) creastone mixing process, identified as IA-2, with a maximum capacity of 534 tons of creastone per year, controlled by one (1) baghouse identified as CE-3, and exhausting to stack S-3; [326 IAC 6.5-1-2]

- (5) Two (2) wet mixers, identified as IA-3a and IA-3b, with a maximum capacity of 324 tons per year of chrysler clay or a capacity of 83 tons per year of floral clay, controlled by two (2) baghouses, identified as CE-8a and CE-8b and exhausting to general ventilation; [326 IAC 6.5-1-2]
- (6) One (1) modeling dough mixing operation, identified as IA-4, with a maximum capacity of 131 tons of flour and salt per year, exhausting to general ventilation; [326 IAC 6.5-1-2]
- (7) One (1) miscellaneous dry materials repackaging operation, identified as IA-5, with a maximum capacity of 110 tons per year of powder glaze, exhausting to stack S-20; [326 IAC 6.5-1-2]
- (8) One (1) Rub-N-Buff solvent mixing operation, identified as IA-9, with a maximum capacity of 84 tons per year of solvent and varnish, exhausting to general ventilation;
- (9) One (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, with a maximum capacity of 13 tons per year of solvent, exhausting to general ventilation; and
- (g) Filling drums, pails, or other packaging containers with lubricating oils, waxes, and greases.
- (h) Water based adhesives that are less than or equal to 5% by volume of VOC, excluding HAPs.
- (i) Replacement or repair of electrostatic precipitators, bags in baghouses, and filters in other filtration equipment.
- (j) Blowdown for any of the following: sight glass, boiler, compressors, pumps, and cooling towers.
- (k) Filter or coalescer media changeout.
- (l) A laboratory as defined in 326 IAC 2-7-1(21)(D).
- (m) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]
- (n) Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2][326 IAC 8-3-5]

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, F097-26238-00514, 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 and OES, 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]

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

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 and OES, within a reasonable time, any information that IDEM, OAQ and OES may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The submittal by the Permittee does require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1). Upon request, the Permittee shall also furnish to IDEM, OAQ and OES 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) Where specifically designated by this permit or required by an applicable requirement, any application form, report, or compliance certification submitted shall contain certification by an "authorized individual" of truth, accuracy, and completeness. This certification shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.
- (b) One (1) certification shall be included, using the attached Certification Form, 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 Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

- (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 and OES 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 and OES may require to determine the compliance status of the source.

The submittal by the Permittee does require the certification 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 and OES 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) If required by specific condition(s) in Section D of this permit, the Permittee shall maintain and implement Preventive Maintenance Plans (PMPs) 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.
- (b) A copy of the PMPs shall be submitted to IDEM, OAQ and OES upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ and OES. IDEM, OAQ and OES may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions or potential to emit. The PMPs do not require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

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, and OES within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

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

Telephone Number: 317-233-0178 (ask for Compliance Section)

Facsimile Number: 317-233-6865

Office of Environmental Services phone: (317) 327-2234; fax: (317) 327-2274

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

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

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

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

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

- (a) All terms and conditions of permits established prior to F097-26238-00514 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 Deviations from Permit Requirements and Conditions [326 IAC 2-8-4(3)(C)(ii)]

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

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

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

using the attached Quarterly Deviation and Compliance Monitoring Report, or its equivalent. A deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report.

The Quarterly Deviation and Compliance Monitoring Report does require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

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

**B.16 Permit Modification, Reopening, Revocation and Reissuance, or Termination
[326 IAC 2-8-4(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 the certification 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 and OES 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 and OES 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 and OES at least

thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ and OES may provide a shorter time period in the case of an emergency.
[326 IAC 2-8-8(c)]

B.17 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 OES 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 the certification 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
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

- (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 and OES 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 and OES takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified in writing by IDEM, OAQ and OES any additional information identified as being needed to process the application.

B.18 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
Permits Branch, Office of Air Quality
100 North Senate Avenue

MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

Any such application shall be certified 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.19 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
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

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 and OES 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.20 Source Modification Requirement [326 IAC 2-8-11.1]

A modification, construction, or reconstruction is governed by the requirements of 326 IAC 2 and 326 IAC 2-8-11.1.

B.21 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, and OES 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.22 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
Permits Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

The application which shall be submitted by the Permittee does require the certification 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.23 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 and OES within thirty (30) calendar days of receipt of a billing. Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ and OES 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.24 Advanced Source Modification Approval [326 IAC 2-8-4(11)] [326 IAC 2-1.1-9]

- (a) The requirements to obtain a permit modification under 326 IAC 2-8-11.1 are satisfied by this permit for the proposed emission units, control equipment or insignificant activities in Sections A.2 and A.3.
- (b) Pursuant to 326 IAC 2-1.1-9 any permit authorizing construction may be revoked if construction of the emission unit has not commenced within eighteen (18) months from the date of issuance of the permit, or if during the construction, work is suspended for a continuous period of one (1) year or more.

B.25 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 any regulated pollutant, except particulate matter (PM), from the entire source shall be limited to less than one hundred (100) tons per twelve (12) consecutive month period.
 - (2) 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
 - (3) 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) The 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. This limitation shall make the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration (PSD) not applicable.
- (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 that 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 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

- (a) Opacity shall not exceed an average of thirty percent (30%) 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 or incinerate any waste or refuse except as provided in 326 IAC 4-2 and 326 IAC 9-1-2.

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

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

C.6 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
Asbestos Section, Office of Air Quality
100 North Senate Avenue
MC 61-52 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue

Indianapolis, Indiana 46221

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification by 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.7 Performance Testing [326 IAC 3-6]

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

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

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

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require certification 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 certification 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 and OES not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ and OES 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.8 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.9 Compliance Monitoring [326 IAC 2-8-4(3)][326 IAC 2-8-5(a)(1)]

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

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

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

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

The notification which shall be submitted by the Permittee does require the certification by 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.10 Monitoring Methods [326 IAC 3] [40 CFR 60] [40 CFR 63]

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

C.11 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.12 Emergency Reduction Plans [326 IAC 1-5-2] [326 IAC 1-5-3]

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

- (a) The Permittee prepared and submitted written emergency reduction plans (ERPs) consistent with safe operating procedures on July 11, 2008.
- (b) Upon direct notification by IDEM, OAQ and OES that a specific air pollution episode level is in effect, the Permittee shall immediately put into effect the actions stipulated in the approved ERP for the appropriate episode level. [326 IAC 1-5-3]

C.13 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.14 Response to Excursions or Exceedances [326 IAC 2-8-4] [326 IAC 2-8-5]

- (a) Upon detecting an excursion or exceedance, the Permittee shall restore operation of the emissions unit (including any control device and associated capture system) to its normal or usual manner of operation as expeditiously as practicable in accordance with good air pollution control practices for minimizing emissions.
- (b) The response shall include minimizing the period of any startup, shutdown or malfunction and taking any necessary corrective actions to restore normal operation and prevent the likely recurrence of the cause of an excursion or exceedance (other than those caused by excused startup or shutdown conditions). Corrective actions may include, but are not limited to, the following:
 - (1) initial inspection and evaluation;
 - (2) recording that operations returned to normal without operator action (such as through response by a computerized distribution control system); or
 - (3) any necessary follow-up actions to return operation to within the indicator range, designated condition, or below the applicable emission limitation or standard, as applicable.
- (c) A determination of whether the Permittee has used acceptable procedures in response to an excursion or exceedance will be based on information available, which may include, but is not limited to, the following:
 - (1) monitoring results;
 - (2) review of operation and maintenance procedures and records; 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 maintain the following records:
 - (1) monitoring data;
 - (2) monitor performance data, if applicable; and
 - (3) corrective actions taken.

C.15 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 take appropriate response actions. The Permittee shall submit a description of these response actions to IDEM, OAQ and OES, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize excess emissions from the affected facility while the response actions are being implemented.
- (b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAQ that retesting in one hundred twenty (120) days is not practicable, IDEM, OAQ may extend the retesting deadline.
- (c) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do require the certification by 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.16 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 or OES makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner or OES within a reasonable time.
- (b) Unless otherwise specified in this permit, all record keeping requirements not already legally required shall be implemented within ninety (90) days of permit issuance.

C.17 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. This report shall be submitted within thirty (30) days of the end of the reporting period. The Quarterly Deviation and Compliance Monitoring Report shall include the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (b) The report required in (a) of this condition and reports required by conditions in Section D of this permit shall be submitted to:

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

and

Indianapolis Office of Environmental Services
2700 South Belmont Avenue
Indianapolis, Indiana 46221

- (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 and OES on or before the date it is due.
- (d) Unless otherwise specified in this permit, all reports required in Section D of this permit shall be submitted within thirty (30) days of the end of the reporting period. All reports do require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (e) 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.18 Compliance with 40 CFR 82 and 326 IAC 22-1

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

- (a) Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to 40 CFR 82.156.
- (b) Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to 40 CFR 82.158.
- (c) Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to 40 CFR 82.161.

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Clay Mixing and Fire Brick Cutting

Crude Clay Department:

- (a) One (1) clay mixing area identified as EU-03a, constructed in 2004, with a maximum capacity of 87,600 tons of dry crude clay per year, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21, and comprised of the following:
 - (1) Two (2) mixer-extruders; and
 - (2) One (1) crude clay bagger.
- (b) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03b (formerly part of EU-01) and mixing red clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per year; with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
- (c) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03c and mixing white clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per year, installed in 2004, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
- (d) Eight (8) crude clay storage silos, identified as EU-12, constructed in 2004, with a maximum capacity of 175,200 tons per year of crude clay, with particulate emissions controlled by five (5) vent filters, identified as IP-2 through IP-5 and IP-12 and exhausting through stacks S-5 through S-8 and S-25.
- (e) Three (3) in-use silos, identified as EU-13, constructed in 2004, with a maximum capacity of 87,600 tons per year of clay, with particulate emissions controlled by three (3) vent filters, identified as IP-7, IP-8, and IP-9 and exhausting through stacks S-10, S-11 and S-22.
- (f) One (1) scale/pneumatic blender system, identified as IA-12, constructed in 2004, with a maximum capacity of 87,600 tons per year of crude clay, with particulate emissions controlled by three (3) vent filters, identified as IP-6, IP-10 and IP-11, and exhausting through stacks S-9, S-23 and S-24.

Kiln Department:

- (g) One (1) fire brick cutting operation, identified as EU-06, constructed in 2004 and modified in 2007, with a maximum capacity of 100 pounds of fire brick per hour, with particulate emissions controlled by one (1) baghouse, identified as CE-4, exhausting to stack S-12, and comprised of the following:
 - (1) Five (5) fire brick cutters;
 - (2) One (1) CNC fire brick router;
 - (3) Two (2) fire brick shapers; and
 - (4) One (1) fire brick sander.

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

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Clay Mixing and Fire Brick Cutting - Insignificant Activities

Crude Clay Department:

- (a) One (1) mixing operation, identified as EU-04, comprised of one (1) sack dump blender, constructed in 2004, with a maximum capacity of 1,500 tons per year of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

Crude Clay Department:

- (b) One (1) mixing operation, identified as EU-04d, comprised of one (1) sack dump blender, receiving approval to construct in 2008, with a maximum capacity of 300 pounds per hour of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

(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 PM10 FESOP Limit [326 IAC 2-8]

- (a) Pursuant to 326 IAC 2-8, combined total PM10 emissions from the Crude Clay Department, EU-03a, EU-03b, EU-03c, EU-04 and EU-04d, which exhaust through stack S-21, shall not exceed 1.94 pounds per hour.
- (b) Pursuant to 326 IAC 2-8, PM10 emissions from the fire brick cutting operation, EU-06, which exhaust through S-12, shall not exceed 1.94 pounds per hour.

Compliance with these limits combined with the potential to emit from all other emission units at this source limit the source wide combined total PM10 emissions to less than one hundred (100) tons per twelve (12) consecutive month period with compliance determined at the end of each month. Compliance with this FESOP limit renders the requirements of 326 IAC 2-7 (Part 70 Permit Program) not applicable.

D.1.2 PM2.5 Non-attainment New Source Review Limit [326 IAC 2-1.1-5]

- (a) Pursuant to 326 IAC 2-1.1-5, the combined total PM2.5 emissions from the Crude Clay Department, EU-03a, EU-03b, EU-03c, EU-04 and EU-04d, which exhaust through stack S-21, shall not exceed 1.94 pounds per hour.
- (b) Pursuant to 326 IAC 2-1.1-5, PM2.5 emissions from the fire brick cutting operation, EU-06, which exhaust through S-12, shall not exceed 1.94 pounds per hour.

Compliance with these limits, combined with the potential to emit from all other emission units at this source, will limit the source wide combined total PM2.5 emissions to less than one hundred (100) tons per twelve (12) consecutive month period with compliance determined at the end of each month. Compliance with this limit renders the requirements of 326 IAC 2-1.1-5 (Non-attainment New Source Review) not applicable.

D.1.3 Particulate Matter (PM) Limitations [326 IAC 6.5]

Pursuant to 326 IAC 6.5 (Particulate Matter Limitations Except Lake County), particulate matter (PM) emissions from emission unit EU-03a, EU-03b, EU-03c, EU-12, EU-13, IA-12, EU-06, EU-

04 and EU-04d shall each not exceed three hundredths (0.03) grains per dry standard cubic foot of exhaust air.

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

A Preventive Maintenance Plan, in accordance with Section B - Preventive Maintenance Plan, of this permit, is required for these facilities and any control devices.

Compliance Determination Requirements

D.1.5 Particulate Matter (PM)

In order to comply with Conditions D.1.1, D.1.2 and D.1.3, the baghouses for particulate matter (PM), PM10 and PM2.5 control in EU-03a, EU-03b, EU-03c, EU-12, EU-13, IA-12, EU-06, EU-04 and EU-04d shall be in operation at all times emission units EU-03a, EU-03b, EU-03c, EU-12, EU-13, IA-12, EU-06, EU-04 and EU-04d are in operation.

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

D.1.6 Visible Emissions Notations

- (a) Once per day visible emission notations of the Crude Clay Department baghouse stack exhaust, S-21, and the fire brick cutting baghouse stack exhaust, S-12, shall be performed 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 in accordance with Section C – Response to Excursions and Exceedances. Failure to take response steps in accordance with Section C - Response to Excursions and Exceedances, shall be considered a deviation from this permit.

D.1.7 Parametric Monitoring

The Permittee shall record the total static pressure drop across the baghouses used in conjunction with EU-03a, EU-03b, EU-03c, EU-04, EU-04d and EU-06 at least once per day when EU-03a, EU-03b, EU-03c, EU-04, EU-04d and EU-06 are in operation and as stated below:

- (a) For the Crude Clay Department baghouse, CE-9, (EU-03a, EU-03b, EU-03c, EU-04 and EU-04d), the pressure drop across the baghouse should be in the normal manufacturer range of 2.5 to 4.1 inches of water or a range established during the latest stack test. When for any one reading the pressure drop across the baghouse is outside the "normal" range of operation, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions and Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions and Exceedances, shall be considered a deviation from the permit.

- (b) For the Kiln Department baghouse, CE-4 (EU-06), the pressure drop across the baghouse should be in the normal manufacturer range of 2 to 4 inches of water or a range established during the latest stack test. When for any one reading the pressure drop across the baghouse is outside the "normal" range of operation, the Permittee shall take reasonable response steps in accordance with Section C - Response to Excursions and Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions and Exceedances, shall be considered a deviation from the permit.

D.1.8 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).
- (a) 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 emission unit. 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.1.9 Record Keeping Requirement

- (a) To document compliance with Condition D.1.6, the Permittee shall maintain daily records of visible emission notations of S-21 and S-12 stack exhausts. The Permittee shall include in its daily records when a visible emission notation is not taken and the reason for the lack of visible emission notation (i.e. the process did not operate that day).
- (b) To document compliance with Condition D.1.7, the Permittee shall maintain daily records of the total static pressure drop across the baghouses identified in Condition D.1.7. The Permittee shall include in its daily records when a static pressure drop notation is not taken and the reason for the lack of static pressure drop notation (i.e. the process did not operate that day).
- (c) All records shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Surface Coating

- (h) One (1) kiln paint booth, identified as EU-07, constructed in 2004, with a maximum usage of 1.47 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-5, exhausting to stack S-13.
- (i) One (1) Brent paint booth, identified as EU-08, constructed in 2004, with a maximum usage of 4.32 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.
- (j) One (1) touch-up process for the Brent paint booth, identified as EU-08a, constructed in 2004, with a maximum usage of 1.12 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.

(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 (PM) Limitations [326 IAC 6.5]

Pursuant to 326 IAC 6.5 (Particulate Matter Limitations Except Lake County), particulate matter (PM) emissions from emission unit EU-07, EU-08, EU-08a shall each not exceed three hundredths (0.03) grains per dry standard cubic foot of exhaust air.

D.2.2 Volatile Organic Compound (VOC) Limitations [326 IAC 8-2-9]

Pursuant to 326 IAC 8-2-9, (Surface Coating Emission Limitations: Miscellaneous Metal Coating Operations), the Permittee shall not cause or allow the discharge into the atmosphere of any volatile organic compounds (VOC) from emission unit EU-08 in excess of three and five tenths (3.5) pounds of VOC per gallon of coating, excluding water, as delivered to the applicator. All solvents sprayed from the application equipment in emission unit EU-08 during cleanup or color changes shall be directed into containers. Said containers shall be closed as soon as the solvent spraying is complete. In addition, all waste solvent shall be disposed of in such a manner that minimizes evaporation.

D.2.3 Volatile Organic Compound (VOC) Limitations [326 IAC 8-2-9]

The actual VOC emissions in the kiln paint booth, identified as EU-07, and the actual VOC emissions in the touch-up process for the Brent paint booth, identified as EU-08a, shall each be less than fifteen (15) pounds per day such that 326 IAC 8-2-9 (Surface Coating Emission Limitations: Miscellaneous Metal Coating Operations) does not apply.

D.2.4 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan, in accordance with Section B - Preventive Maintenance Plan, of this permit, is required for these facilities and any control devices.

Compliance Determination Requirements

D.2.5 Particulate Matter (PM)

In order to comply with Condition D.2.1, the dry filters for particulate matter (PM) control shall be in operation at all times emission unit EU-07, EU-08 and EU-08a are in operation.

D.2.6 Volatile Organic Compounds [326 IAC 8-1-2][326 8-1-4]

Compliance with the VOC content and actual VOC daily emission rate in Conditions D.2.2 and D.2.3 shall be determined pursuant to 326 IAC 8-1-4(a)(3) and 326 IAC 8-1-2(a) by preparing or obtaining from the manufacturer the copies of the “as supplied” and “as applied” VOC data sheets. IDEM, OAQ and OES reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.

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

D.2.7 Monitoring

- (a) Daily inspections shall be performed to verify the placement, integrity and particle loading of the dry filters in EU-07, EU-08 and EU-08a. To monitor the performance of the dry filters, weekly observations shall be made of the overspray from the surface coating booth stacks S-13 and S-14 while EU-07, EU-08 or EU-08a are in operation. If a condition exists which should result in a response step, the Permittee shall take reasonable response steps in accordance with Section C – Response to Exceedances. Failure to take response steps in accordance with Section C – Response to Exceedances shall be considered a deviation of this permit.
- (b) Monthly inspections shall be performed of the coating emissions from stacks S-13 and S-14 and the presence of overspray on the rooftops and the nearby ground. When there is a noticeable change in overspray emission, or evidence of overspray emission is observed, the Permittee, shall take reasonable response steps in accordance with Section C – Response to Exceedances. Failure to take response steps in accordance with Section C – Response to Exceedances shall be considered a deviation of this permit.

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

D.2.8 Record Keeping Requirements

- (a) To document compliance with Conditions D.2.2, D.2.3, and D.2.6, the Permittee shall maintain records in accordance with (1) through (4) below. Records maintained for (1) through (4) shall be taken as stated below and shall be complete and sufficient to establish compliance with Conditions D.2.2, D.2.3 and D.2.6.
 - (1) The VOC content of each coating material and solvent used less water for EU-07, EU-08 and EU-08a.
 - (2) The amount of coating material and solvent used on daily basis for EU-07, EU-08 and EU-08a.
 - (A) Records shall include purchase orders, invoices, and material safety data sheets (MSDS) necessary to verify the type and amount used;
 - (B) Solvent usage records shall differentiate between those added to coatings and those used as cleanup solvents;
 - (3) The daily cleanup solvent usage for EU-07, EU-08 and EU-08a; and
 - (4) The weight of VOC emitted each day for EU-07, EU-08 and EU-08a.
- (b) To document compliance with Condition D.2.7, the Permittee shall maintain a log of weekly overspray observations, and daily and monthly inspections.

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

SECTION D.3 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description: Insignificant Activities

- (c) Natural gas-fired combustion sources with a heat input capacity of less than ten million (10,000,000) British thermal units per hour: [326 IAC 6.5]
- (1) One (1) Weil natural gas-fired boiler, identified as EU-11, with a maximum capacity of 1.15 million British thermal units per hour, exhausting to stack S-17; and
 - (2) Fifteen space heaters, identified as IA-11, one with a capacity of 2.5 MMBtu/hr, two with a capacity of 0.75 MMBtu/hr and twelve with a capacity of 0.15 MMBtu/hr and all burning only natural gas.
- (d) The following equipment related to manufacturing activities not resulting in the emission of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment:
- (1) One (1) welding operation, identified as IA-8, with a maximum capacity of 1,621 tons of steel per year and 6 tons of welding wire per year, exhausting to general ventilation. [326 IAC 6.5-1-2]
- (e) Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to 4,000 actual cubic feet per minute, including the following: deburring, buffing, polishing, abrasive blasting, pneumatic conveying, and woodworking operations:
- (1) One (1) woodworking operation, identified as IA-7, with a maximum capacity of 136 tons per year, exhausting through dust collectors to general ventilation. [326 IAC 6.5-1-2]
- (f) Emission units with PM and PM-10 emissions less than five (5) tons per year, SO₂, NO_x, and VOC emissions less than ten (10) tons per year, CO emissions less than twenty-five (25) tons per year, lead emissions less than two-tenths (0.2) tons per year, single HAP emissions less than one (1) ton per year, and combination of HAPs emissions less than two and a half (2.5) tons per year:
- (1) One (1) leaded glaze mixing area 1, identified as EU-01a, with a capacity of 800 tons of leaded glaze per year, particulate emissions controlled by a HEPA Filter identified as CE-10, and exhausting internally; [326 IAC 6.5-1-2]
 - (2) Three (3) unleaded glaze mixers in one area identified as EU-01b, with a combined maximum capacity of 2,400 tons of unleaded glaze per year, with particulate emissions controlled by one (1) baghouse identified as CE-1, exhausting to stack S-1; [326 IAC 6.5-1-2]
 - (3) One (1) Sculpt-a-Mold batch mixer, identified as EU-05, receiving approval to construct in 2003, with a maximum capacity of 915 tons of paper mache powder per year, controlled by one (1) cyclone/bagfilter and exhausting internally; [326 IAC 6.5-1-2]

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

SECTION D.3 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description: Insignificant Activities

- (4) One (1) creastone mixing process, identified as IA-2, with a maximum capacity of 534 tons of creastone per year, controlled by one (1) baghouse identified as CE-3, and exhausting to stack S-3; [326 IAC 6.5-1-2]
- (5) Two (2) wet mixers, identified as IA-3a and IA-3b, with a maximum capacity of 324 tons per year of chrysler clay or a capacity of 83 tons per year of floral clay, controlled by two (2) baghouses, identified as CE-8a and CE-8b and exhausting to general ventilation; [326 IAC 6.5-1-2]
- (6) One (1) modeling dough mixing operation, identified as IA-4, with a maximum capacity of 131 tons of flour and salt per year, exhausting to general ventilation; [326 IAC 6.5-1-2]
- (7) One (1) miscellaneous dry materials repackaging operation, identified as IA-5, with a maximum capacity of 110 tons per year of powder glaze, exhausting to stack S-20; [326 IAC 6.5-1-2]
- (8) One (1) Rub-N-Buff solvent mixing operation, identified as IA-9, with a maximum capacity of 84 tons per year of solvent and varnish, exhausting to general ventilation;
- (9) One (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, with a maximum capacity of 13 tons per year of solvent, exhausting to general ventilation; and
- (g) Filling drums, pails, or other packaging containers with lubricating oils, waxes, and greases.
- (h) Water based adhesives that are less than or equal to 5% by volume of VOC, excluding HAPs.
- (i) Replacement or repair of electrostatic precipitators, bags in baghouses, and filters in other filtration equipment.
- (j) Blowdown for any of the following: sight glass, boiler, compressors, pumps, and cooling towers.
- (k) Filter or coalescer media changeout.
- (l) A laboratory as defined in 326 IAC 2-7-1(21)(D).
- (m) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]
- (n) Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2][326 IAC 8-3-5]

(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.3.1 Volatile Organic Compounds (VOC) [326 IAC 8-3-5]

- (a) Pursuant to 326 IAC 8-3-5(a) (Cold Cleaner Degreaser Operation and Control), for cold cleaner degreaser operations without remote solvent reservoirs existing as of July 1, 1990, located in Clark, Elkhart, Floyd, Lake, Marion, Porter or St. Joseph Counties, the Permittee shall ensure that the following requirements are met:
- (1) Equip the degreaser with a cover. The cover must be designed so that it can be easily operated with one (1) hand if:
 - (A) The solvent volatility is greater than two (2) kiloPascals (fifteen (15) millimeters of mercury or three-tenths (0.3) pounds per square inch) measured at thirty-eight degrees Celsius (38EC) (one hundred degrees Fahrenheit (100EF));
 - (B) The solvent is agitated; or
 - (C) The solvent is heated.
 - (2) Equip the degreaser with a facility for draining cleaned articles. If the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury or six-tenths (0.6) pounds per square inch) measured at thirty-eight degrees Celsius (38EC) (one hundred degrees Fahrenheit (100EF)), then the drainage facility must be internal such that articles are enclosed under the cover while draining. The drainage facility may be external for applications where an internal type cannot fit into the cleaning system.
 - (3) Provide a permanent, conspicuous label which lists the operating requirements outlined in subsection (b).
 - (4) The solvent spray, if used, must be a solid, fluid stream and shall be applied at a pressure, which does not cause excessive splashing.
 - (5) Equip the degreaser with one (1) of the following control devices if the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury or six-tenths (0.6) pounds per square inch) measured at thirty-eight degrees Celsius (38EC) (one hundred degrees Fahrenheit (100EF)), or if the solvent is heated to a temperature greater than forty-eight and nine-tenths degrees Celsius (48.9EC) (one hundred twenty degrees Fahrenheit (120EF)):
 - (A) A freeboard that attains a freeboard ratio of seventy-five hundredths (0.75) or greater.
 - (B) A water cover when solvent is used is insoluble in, and heavier than, water.
 - (C) Other systems of demonstrated equivalent control such as a refrigerated chiller or carbon adsorption. Such systems shall be submitted to the U.S. EPA as a SIP revision.
- (b) Pursuant to 326 IAC 8-3-5(a) (Cold Cleaner Degreaser Operation and Control), for cold cleaner degreaser operations without remote solvent reservoirs existing as of July 1,

1990, located in Clark, Elkhart, Floyd, Lake, Marion, Porter or St. Joseph Counties, the Permittee shall ensure that the following requirements are met:

- (1) Close the cover whenever articles are not being handled in the degreaser.
- (2) Drain cleaned articles for at least fifteen (15) seconds or until dripping ceases.
- (3) Store waste solvent only in covered containers and prohibit the disposal or transfer of waste solvent in any manner in which greater than twenty percent (20%) of the waste solvent by weight could evaporate.

D.3.2 Volatile Organic Compounds (VOC) [326 IAC 8-3-2]

Pursuant to 326 IAC 8-3-2 (Cold Cleaner Operations), for cold cleaning operations constructed after January 1, 1980, the Permittee shall:

- (a) Equip the cleaner with a cover;
- (b) Equip the cleaner with a facility for draining cleaned parts;
- (c) Close the degreaser cover whenever parts are not being handled in the cleaner;
- (d) Drain cleaned parts for at least fifteen (15) seconds or until dripping ceases;
- (e) Provide a permanent, conspicuous label summarizing the operation requirements;
- (f) Store waste solvent only in covered containers and not dispose of waste solvent or transfer it to another party, in such a manner that greater than twenty percent (20%) of the waste solvent (by weight) can evaporate into the atmosphere.

D.3.3 Particulate Matter (PM) Limitations [326 IAC 6.5]

Pursuant to 326 IAC 6.5 (Particulate Matter Limitations Except Lake County), particulate matter (PM) emissions from the mixing operations (EU-01a, EU-01b), Sculpt-a-Mold batch mixer (EU-05), creastone mixing process (IA-2), wet mixers (IA-3a & IA-3b), dough mixing operation (IA-4), repackaging operation (IA-5), woodworking operation (IA-7), welding operation (IA-8) and IA-11 shall be limited to 0.03 grain per dry standard cubic foot of exhaust air.

D.3.4 Particulate Matter (PM) Limitations [326 IAC 6.5-1-2(b)(3)]

Pursuant to 326 IAC 6.5-1-2(b)(3), the Weil natural gas-fired boiler, EU-11, shall not discharge a particulate matter content greater than one-hundredths (0.01) grain per dry standard cubic foot (dscf) of exhaust air when firing natural gas.

Compliance Determination Requirements

D.3.5 Particulate Matter (PM)

In order to comply with Conditions D.3.3, the baghouses for particulate control shall be in operation and control emissions from mixing operation (EU-01b), wet mixers (IA-3a & IA-3b), woodworking operation (IA-7), Sculpt-a-Mold batch mixer (EU-05), and the creastone mixing process (IA-2) at all times that EU-01b, IA-3a & IA-3b, IA-7, EU-05, and IA-2 are in operation.

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

D.3.6 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 emission unit. 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.

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
and OES**

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

Source Name: American Art Clay Company, Incorporated
Source Address: 6060 North Guion Road, Indianapolis, Indiana 46254
Mailing Address: 6060 North Guion Road, Indianapolis, Indiana 46254
FESOP Permit No.: F097-26238-00514

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 BRANCH
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
Phone: 317-233-0178
Fax: 317-233-6865**

and OES

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

Source Name: American Art Clay Company, Incorporated
Source Address: 6060 North Guion Road, Indianapolis, Indiana 46254
Mailing Address: 6060 North Guion Road, Indianapolis, Indiana 46254
FESOP Permit No.: F097-26238-00514

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: _____

A certification is not required for this report.

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
 OFFICE OF AIR QUALITY
 COMPLIANCE DATA SECTION
 and OES
 FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
 QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT**

Source Name: American Art Clay Company, Incorporated
 Source Address: 6060 North Guion Road, Indianapolis, Indiana 46254
 Mailing Address: 6060 North Guion Road, Indianapolis, Indiana 46254
 FESOP Permit No.: F097-26238-00514

Months: _____ **to** _____ **Year:** _____

<p>This report shall be submitted quarterly based on a calendar year. Any deviation from the requirements, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. 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 ΔNo deviations occurred this reporting period@.</p>	
<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: _____

Attach a signed certification to complete this report.

**Indiana Department of Environmental Management
Office of Air Quality
and
City of Indianapolis
Office of Environmental Services**

**Addendum to the Technical Support Document for a
Federally Enforceable State Operating Permit Renewal**

Source Name:	American Art Clay Company, Incorporated
Source Location:	6060 North Guion Road, Indianapolis, Indiana 46254
County:	Marion
SIC Code:	3269, 3479 & 3499
Permit Renewal No.:	F097-26238-00514
Permit Reviewer:	M. Caraher

On July 10, 2008, the Indiana Department of Environmental Management, Office of Air Quality (OAQ) and the City of Indianapolis, Office of Environmental Services (OES) had a notice published in the Indianapolis Star, Indianapolis, Indiana, stating that American Art Clay Company, Incorporated (hereafter referred to as AMACO) had applied to renew a Federally Enforceable State Operating Permit (FESOP) to continue to operate a stationary source that manufactures clay and assembles kilns and potter's wheels. The notice also stated that OAQ and OES proposed to issue a permit for this operation and provided information on how the public could review the proposed permit and other documentation. Finally, the notice informed interested parties that there was a period of thirty (30) days to provide comments on whether or not this permit should be issued as proposed.

On July 11, 2008, AMACO submitted a revised Emergency Reduction Plan (pursuant to 326 IAC 1-5-2 and Condition C.14 of F097-18189-00514 issued on December 9, 2003). On July 28, 2008, BCA Consultants, Inc., on behalf of AMACO, submitted comments on the draft FESOP Renewal. In addition, OAQ and OES have made revisions to the permit to reflect the May 8, 2008 U.S. EPA guidance on New Source Review Implementation for PM_{2.5}.

Upon further review, the OAQ and OES have decided to make the following revisions to the FESOP Renewal. The TSD will remain as it originally appeared when published. Changes to the permit or technical support material that occur after the permit has published for public notice are documented in this Addendum to the Technical Support Document. This accomplishes the desired result of ensuring that these types of concerns are documented and part of the record regarding this permit decision. Bolded language has been added and the language with strikeout has been deleted. The Table of Contents has been modified to reflect these changes.

The comments and the responses, including changes to the permit, are as follows:

AMACO Comment 1

After reviewing the draft permit released for public notice and auditing its operation, AMACO has identified a number of corrections that should be made to Section A of the draft permit to more accurately reflect the operation at the site. None of the changes reflect or result in a change in capacity or PTE. These corrections should be repeated for Section D and the TSD. A new process flow diagram with the requested corrections in bold is also submitted.

In Permit Section A.2(d), there are actually 8 silos for clay storage rather than 6. 7 are currently in use and the 8th may be put in use later. They are controlled by 5 vent filters (whose function is different than standard baghouses) rather than 4 baghouses. The capacity of the system (175,000 tons per year) is unchanged since only one silo at a time can be used.

In Permit Section A.2(e), there are actually 3 use bins with 3 vent filters (rather than 6 use bins with 2 baghouses) which serve the 2 mixer/extruders and 1 bagger. The maximum capacity remains 87,600 tons per year.

In Permit Section A.2(f), the scale/pneumatic blender system includes a vacuum bottle and 2 use bins controlled by 3 vent filters (rather than 2 baghouses). The maximum capacity remains unchanged at 87,600 tons per year.

In Permit Section A.2(g)(3), there are 2 fire brick shapers not 1.

In Permit Section A.3, the emission units in item (c) and (g)(10) are now deleted. For emission unit (g)(3), a new small (drum-top) style dust collector was added that appears to provide better control.

Changes should be made to the calculations spreadsheet in the Clay worksheet to reflect the changes above. Four vent filters were added and the capacity redistributed among the Storage Silos, the Scale/Blender system and the Use Bins. The Summary worksheet should also be changed to reflect the deletion of the printing operation.

Response to Comment 1

The requested changes to Sections A.2, A.3, D.1 and D.3 have been made as shown below. The TSD will remain as it originally appeared when published. The new process flow diagrams with the requested corrections in bold are now included as part of the FESOP Renewal application package submitted by AMACO. None of the changes reflect or result in a change in capacity or PTE except for the deletion of the printing operation. The effect of the deletion of the printing operation in the PTE after issuance is discussed later in this TSD Addendum in OAQ/OES Change 1. The submittal date of the revised Emergency Reduction Plan is now updated in Condition C.12.

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:

Clay Mixing and Fire Brick Cutting

Crude Clay Department:

...

- (d) **Eight (8)** ~~Six (6)~~ crude clay storage silos, identified as EU-12, constructed in 2004, with a maximum capacity of 175,200 tons per year of crude clay, with particulate emissions controlled by **five (5) vent filters** ~~four (4) baghouses~~, identified as IP-2 through IP-5 and **IP-12** and exhausting through stacks S-5 through S-8 and **S-25**.
- (e) **Three (3)** ~~Six (6)~~ in-use silos, identified as EU-13, constructed in 2004, with a maximum capacity of 87,600 tons per year of clay, with particulate emissions controlled by **three (3) vent filters**, ~~two (2) baghouses~~, identified as IP-7, and IP-8, and **IP-9** and exhausting through stacks S-10, and S-11 and **S-22**.
- (f) One (1) scale/pneumatic blender **system**, identified as IA-12, constructed in 2004, with a maximum capacity of 87,600 tons per year of crude clay, with particulate emissions controlled by **three (3) vent filters** ~~one (1) baghouse~~, identified as IP-6, **IP-10 and IP-11**, and exhausting through stacks **S-9, S-23 and S-24**.

Kiln Department:

- (g) One (1) fire brick cutting operation, identified as EU-06, constructed in 2004 and modified in 2007, with a maximum capacity of 100 pounds of fire brick per hour, with particulate emissions controlled by one (1) baghouse, identified as CE-4, exhausting to stack S-12, and comprised of the following:
- (1) Five (5) fire brick cutters;
 - (2) One (1) CNC fire brick router;
 - (3) **Two (2)** ~~One (1)~~ fire brick shapers; and
 - (4) One (1) fire brick sander.

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:

Crude Clay Department:

- (a) One (1) mixing operation, identified as EU-04, comprised of one (1) sack dump blender, constructed in 2004, with a maximum capacity of 1,500 tons per year of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

~~Crude Clay Department:~~

- (b) One (1) mixing operation, identified as EU-04d, comprised of one (1) sack dump blender, receiving approval to construct in 2008, with a maximum capacity of 300 pounds per hour of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

Other Insignificant Activities:

- ~~(c) Trimmers that do not produce fugitive emissions and that are equipped with a dust collection or trim material recovery device such as a bag filter or cyclone. [326 IAC 6.5-1-2]~~

- (c) (d)** Natural gas-fired combustion sources with a heat input capacity of less than ten million (10,000,000) British thermal units per hour: [326 IAC 6.5]

- (1) One (1) Weil natural gas-fired boiler, identified as EU-11, with a maximum capacity of 1.15 million British thermal units per hour, exhausting to stack S-17; and
- (2) Fifteen space heaters, identified as IA-11, one with a capacity of 2.5 MMBtu/hr, two with a capacity of 0.75 MMBtu/hr and twelve with a capacity of 0.15 MMBtu/hr and all burning only natural gas.

- (d) (e)** The following equipment related to manufacturing activities not resulting in the emission of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment:

- (1) One (1) welding operation, identified as IA-8, with a maximum capacity of 1,621 tons of steel per year and 6 tons of welding wire per year, exhausting to general ventilation. [326 IAC 6.5-1-2]

- (e) (f)** Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to

4,000 actual cubic feet per minute, including the following: deburring, buffing, polishing, abrasive blasting, pneumatic conveying, and woodworking operations:

- (1) One (1) woodworking operation, identified as IA-7, with a maximum capacity of 136 tons per year, exhausting through dust collectors to general ventilation. [326 IAC 6.5-1-2]
- (f) ~~(g)~~ Emission units with PM and PM-10 emissions less than five (5) tons per year, SO₂, NO_x, and VOC emissions less than ten (10) tons per year, CO emissions less than twenty-five (25) tons per year, lead emissions less than two-tenths (0.2) tons per year, single HAP emissions less than one (1) ton per year, and combination of HAPs emissions less than two and a half (2.5) tons per year:
- (1) One (1) leaded glaze mixing area 1, identified as EU-01a, with a capacity of 800 tons of leaded glaze per year, particulate emissions controlled by a HEPA Filter identified as CE-10, and exhausting internally; [326 IAC 6.5-1-2]
 - (2) Three (3) unleaded glaze mixers in one area identified as EU-01b, with a combined maximum capacity of 2,400 tons of unleaded glaze per year, with particulate emissions controlled by one (1) baghouse identified as CE-1, exhausting to stack S-1; [326 IAC 6.5-1-2]
 - (3) One (1) Sculpt-a-Mold batch mixer, identified as EU-05, receiving approval to construct in 2003, with a maximum capacity of 915 tons of paper mache powder per year, controlled by one (1) **cyclone/bagfilter and exhausting internally;** ~~baghouse identified as CE-3, exhausting to stack S-3;~~ [326 IAC 6.5-1-2]
 - (4) One (1) creastone mixing process, identified as IA-2, with a maximum capacity of 534 tons of creastone per year, controlled by one (1) baghouse identified as CE-3, and exhausting to stack S-3; [326 IAC 6.5-1-2]
 - (5) Two (2) wet mixers, identified as IA-3a and IA-3b, with a maximum capacity of 324 tons per year of chrysler clay or a capacity of 83 tons per year of floral clay, controlled by two (2) baghouses, identified as CE-8a and CE-8b and exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (6) One (1) modeling dough mixing operation, identified as IA-4, with a maximum capacity of 131 tons of flour and salt per year, exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (7) One (1) miscellaneous dry materials repackaging operation, identified as IA-5, with a maximum capacity of 110 tons per year of powder glaze, exhausting to stack S-20; [326 IAC 6.5-1-2]
 - (8) One (1) Rub-N-Buff solvent mixing operation, identified as IA-9, with a maximum capacity of 84 tons per year of solvent and varnish, exhausting to general ventilation;
 - (9) One (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, with a maximum capacity of 13 tons per year of solvent, exhausting to general ventilation; and
 - ~~(10) One (1) printing operation, identified as IA-10, with a maximum capacity of 2.5 tons of ink and washes per year, exhausting to general ventilation.~~

- (g) ~~(h)~~ Filling drums, pails, or other packaging containers with lubricating oils, waxes, and greases.
- (h) ~~(i)~~ Water based adhesives that are less than or equal to 5% by volume of VOC, excluding HAPs.
- (i) ~~(j)~~ Replacement or repair of electrostatic precipitators, bags in baghouses, and filters in other filtration equipment.
- (j) ~~(k)~~ Blowdown for any of the following: sight glass, boiler, compressors, pumps, and cooling towers.
- (k) ~~(l)~~ Filter or coalescer media changeout.
- (l) ~~(m)~~ A laboratory as defined in 326 IAC 2-7-1(21)(D).
- (m) ~~(n)~~ Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]
- (n) ~~(o)~~ Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2][326 IAC 8-3-5]

C.12 Emergency Reduction Plans [326 IAC 1-5-2] [326 IAC 1-5-3]

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

- (a) The Permittee prepared and submitted written emergency reduction plans (ERPs) consistent with safe operating procedures on **July 11, 2008** ~~July 3, 2008~~.
- (b) Upon direct notification by IDEM, OAQ and OES that a specific air pollution episode level is in effect, the Permittee shall immediately put into effect the actions stipulated in the approved ERP for the appropriate episode level. [326 IAC 1-5-3]

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

Clay Mixing and Fire Brick Cutting

Crude Clay Department:

...

- (d) **Eight (8)** ~~Six (6)~~ crude clay storage silos, identified as EU-12, constructed in 2004, with a maximum capacity of 175,200 tons per year of crude clay, with particulate emissions controlled by **five (5) vent filters** ~~four (4) baghouses~~, identified as IP-2 through IP-5 **and IP-12** and exhausting through stacks S-5 through S-8 **and S-25**.
- (e) **Three (3)** ~~Six (6)~~ in-use silos, identified as EU-13, constructed in 2004, with a maximum capacity of 87,600 tons per year of clay, with particulate emissions controlled by **three (3) vent filters**, ~~two (2) baghouses~~, identified as IP-7, ~~and IP-8~~, **and IP-9** and exhausting through stacks S-10, ~~and S-11~~ **and S-22**.
- (f) One (1) scale/pneumatic blender **system**, identified as IA-12, constructed in 2004, with a maximum capacity of 87,600 tons per year of crude clay, with particulate emissions controlled by **three (3) vent filters** ~~one (1) baghouse~~, identified as IP-6, **IP-10 and IP-11**, and exhausting through stacks **S-9, S-23 and S-24**.

Kiln Department:

- (g) One (1) fire brick cutting operation, identified as EU-06, constructed in 2004 and modified in 2007, with a maximum capacity of 100 pounds of fire brick per hour, with particulate emissions controlled by one (1) baghouse, identified as CE-4, exhausting to stack S-12, and comprised of the following:
- (1) Five (5) fire brick cutters;
 - (2) One (1) CNC fire brick router;
 - (3) **Two (2)** ~~One (1)~~ fire brick shapers; and
 - (4) One (1) fire brick sander.

SECTION D.3 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description: Insignificant Activities

- ~~(c)~~ Trimmers that do not produce fugitive emissions and that are equipped with a dust collection or trim material recovery device such as a bag filter or cyclone. [326 IAC 6.5-1-2]
- (c)** ~~(d)~~ Natural gas-fired combustion sources with a heat input capacity of less than ten million (10,000,000) British thermal units per hour: [326 IAC 6.5]
- (1) One (1) Weil natural gas-fired boiler, identified as EU-11, with a maximum capacity of 1.15 million British thermal units per hour, exhausting to stack S-17; and
 - (2) Fifteen space heaters, identified as IA-11, one with a capacity of 2.5 MMBtu/hr, two with a capacity of 0.75 MMBtu/hr and twelve with a capacity of 0.15 MMBtu/hr and all burning only natural gas.
- (d)** ~~(e)~~ The following equipment related to manufacturing activities not resulting in the emission of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment:
- (1) One (1) welding operation, identified as IA-8, with a maximum capacity of 1,621 tons of steel per year and 6 tons of welding wire per year, exhausting to general ventilation. [326 IAC 6.5-1-2]
- (e)** ~~(f)~~ Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to 4,000 actual cubic feet per minute, including the following: deburring, buffing, polishing, abrasive blasting, pneumatic conveying, and woodworking operations:
- (1) One (1) woodworking operation, identified as IA-7, with a maximum capacity of 136 tons per year, exhausting through dust collectors to general ventilation. [326 IAC 6.5-1-2]
- (f)** ~~(g)~~ Emission units with PM and PM-10 emissions less than five (5) tons per year, SO₂, NO_x, and VOC emissions less than ten (10) tons per year, CO emissions less than twenty-five (25) tons per year, lead emissions less than two-tenths (0.2) tons per year, single HAP emissions less than one (1) ton per year, and combination of HAPs emissions less than two and a half (2.5) tons per year:
- (1) One (1) leaded glaze mixing area 1, identified as EU-01a, with a capacity of 800 tons of

- leaded glaze per year, particulate emissions controlled by a HEPA Filter identified as CE-10, and exhausting internally; [326 IAC 6.5-1-2]
- (2) Three (3) unleaded glaze mixers in one area identified as EU-01b, with a combined maximum capacity of 2,400 tons of unleaded glaze per year, with particulate emissions controlled by one (1) baghouse identified as CE-1, exhausting to stack S-1; [326 IAC 6.5-1-2]
 - (3) One (1) Sculpt-a-Mold batch mixer, identified as EU-05, receiving approval to construct in 2003, with a maximum capacity of 915 tons of paper mache powder per year, controlled by one (1) **cyclone/bagfilter and exhausting internally**; ~~baghouse identified as CE-3, exhausting to stack S-3~~; [326 IAC 6.5-1-2]
 - (4) One (1) creastone mixing process, identified as IA-2, with a maximum capacity of 534 tons of creastone per year, controlled by one (1) baghouse identified as CE-3, and exhausting to stack S-3; [326 IAC 6.5-1-2]
 - (5) Two (2) wet mixers, identified as IA-3a and IA-3b, with a maximum capacity of 324 tons per year of chrysler clay or a capacity of 83 tons per year of floral clay, controlled by two (2) baghouses, identified as CE-8a and CE-8b and exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (6) One (1) modeling dough mixing operation, identified as IA-4, with a maximum capacity of 131 tons of flour and salt per year, exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (7) One (1) miscellaneous dry materials repackaging operation, identified as IA-5, with a maximum capacity of 110 tons per year of powder glaze, exhausting to stack S-20; [326 IAC 6.5-1-2]
 - (8) One (1) Rub-N-Buff solvent mixing operation, identified as IA-9, with a maximum capacity of 84 tons per year of solvent and varnish, exhausting to general ventilation;
 - (9) One (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, with a maximum capacity of 13 tons per year of solvent, exhausting to general ventilation; and
 - ~~(10) One (1) printing operation, identified as IA-10, with a maximum capacity of 2.5 tons of ink and washes per year, exhausting to general ventilation.~~
- (g)** ~~(h)~~ Filling drums, pails, or other packaging containers with lubricating oils, waxes, and greases.
 - (h)** ~~(i)~~ Water based adhesives that are less than or equal to 5% by volume of VOC, excluding HAPs.
 - (i)** ~~(j)~~ Replacement or repair of electrostatic precipitators, bags in baghouses, and filters in other filtration equipment.
 - (j)** ~~(k)~~ Blowdown for any of the following: sight glass, boiler, compressors, pumps, and cooling towers.
 - (k)** ~~(l)~~ Filter or coalescer media changeout.
 - (l)** ~~(m)~~ A laboratory as defined in 326 IAC 2-7-1(21)(D).
 - (m)** ~~(n)~~ Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]
 - (n)** ~~(o)~~ Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2][326 IAC 8-3-5]

OAQ/OES Change 1

Marion County has been classified as nonattainment for PM2.5 in 70 FR 943 dated January 5, 2005. On May 8th, 2008, U.S. EPA promulgated specific New Source Review rules for PM2.5 emissions, and the effective date of these rules was July 15th, 2008. Therefore, direct PM2.5 and SO₂ emissions were reviewed pursuant to the requirements of Non-attainment New Source Review, 326 IAC 2-1.1-5. This existing source is not a major stationary source, under Non-attainment New Source Review (326 IAC 2-1.1-5), because the potential to emit of PM2.5 and SO₂ after issuance are each less than 100 tons per year. Therefore, pursuant to 326 IAC 2-1.1-5, the Non-attainment New Source Review requirements do not apply. However, the potential to emit PM2.5 must be included in the Potential to Emit after issuance table (assuming PM2.5 emissions are equivalent to PM10 emissions). The table is revised in this Addendum as follows:

Process/ Emission Unit	Potential To Emit (tons/year)								
	PM	PM10*	PM2.5 *	SO ₂	VOC	CO	NO _x	Highest Single HAP	Combined HAP
EU-03a, b,c & EU-04 & EU-04d (clay mixing areas)	51.36	8.5 *	8.5 *	negl.	negl.	negl.	negl.	negl.	negl.
EU-12 (Six (6) crude clay storage silos)	30.95	21.59	21.59	negl.	negl.	negl.	negl.	negl.	negl.
EU-13 (Six (6) in-use silos)	15.48	13.15	13.15	negl.	negl.	negl.	negl.	negl.	negl.
IA-12 (scale/pneumatic blender)	15.48	13.15	13.15	negl.	negl.	negl.	negl.	negl.	negl.
EU-06 (fire brick cutting)	27.03	8.5 *	8.5 *	negl.	negl.	negl.	negl.	negl.	negl.
EU-07 (kiln paint booth)	7.76	1.56	1.56	negl.	35.24	negl.	negl.	4.76	5.74
EU-08 (Brent paint booth)	36.97	7.44	7.44	negl.	16.71	negl.	negl.	negl.	negl.
EU-08a (touch-up paint booth)	0.96	0.19	0.19	negl.	17.31	negl.	negl.	6.07	10.60
Degreasing	negl.	negl.	negl.	negl.	0.53	negl.	negl.	negl.	negl.
EU-11 (Weil boiler) & IA-11 (space heaters)	0.06	0.23	0.23	0.02	0.17	2.56	3.04	0.05	0.05
IA-8 (welding)	0.03	0.03	0.03	negl.	negl.	negl.	negl.	negl.	negl.
IA-7 (woodworking)	0.17	0.07	0.07	negl.	negl.	negl.	negl.	negl.	negl.
EU-01a (leaded clay mixing)	1.58	1.34	1.34	negl.	negl.	negl.	negl.	0.03	0.03
EU-01b (unleaded glaze mixers)	3.94	3.35	3.35	negl.	negl.	negl.	negl.	negl.	negl.
EU-05 & IA-2 (sculpt-a-mold mixer & creastone mixing)	2.45	1.18	1.18	negl.	negl.	negl.	negl.	negl.	negl.
IA-3a & IA-3b (two (2) wet mixers)	1.05	0.89	0.89	negl.	negl.	negl.	negl.	negl.	negl.
IA-4 (modeling dough mixer)	0.39	0.09	0.09	negl.	negl.	negl.	negl.	negl.	negl.
IA-5 (dry repackaging)	0.32	0.28	0.28	negl.	negl.	negl.	negl.	negl.	negl.
IA-9 (solvent mixing)	negl.	negl.	negl.	negl.	2.23	negl.	negl.	0.07	0.07
IA-10 (printing)	negl.	negl.	negl.	negl.	1.42	negl.	negl.	negl.	negl.
Title V Major Source Thresholds	NA	100	-	100	100	100	100	10	25

Process/ Emission Unit	Potential To Emit (tons/year)								
	PM	PM10*	PM2.5 *	SO ₂	VOC	CO	NO _x	Highest Single HAP	Combined HAP
PSD & Nonattainment NSR Major Source Thresholds	250	100 250	100	250	250	250	250	NA	NA
Total Emissions	195.98	<100.0	< 100.0	0.02	72.20 73.62	2.56	3.04	6.35	16.50

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". ~~US EPA has directed states to regulate PM10 emissions as surrogate for PM2.5 emissions.~~

* PM10 and PM2.5 from these units are each limited to 1.94 pounds per hour such that the limited potential to emit from these units when combined with the potential to emit PM10 and PM2.5 from all other emission units at the source is less than one hundred (100) tons per twelve (12) consecutive month period and renders the requirements of 327 IAC 2-7 (Part 70 Permit Program) not applicable (see 326 IAC 2-8 discussion).

OAQ/OES Change 2

Assuming PM2.5 emissions are equivalent to PM10 emissions, the unrestricted PM2.5 emissions are greater than one hundred (100) tons per year. By limiting combined PM2.5 emissions after baghouse emission control from emission unit EU-03a, b & c, emission unit EU-04 and EU-04d to 1.94 pounds of PM2.5 per hour, and by limiting PM2.5 emissions after baghouse emission control from emission unit EU-6 to 1.94 pounds of PM2.5 per hour, the potential to emit PM2.5, when combined with the potential to emit PM2.5 from all other emission units at this source, limits the potential to emit PM2.5 to less than one hundred (100) tons per twelve (12) consecutive month period with compliance determined at the end of each month. Therefore, the requirements of 326 IAC 2-1.1-5 (Non-attainment New Source Review) do not apply. As a result, a new condition is inserted as D.1.2 to limit PM2.5 emissions, such that 326 IAC 2-1.1-5 does not apply, with the renumbering of all subsequent Section D.1 conditions as follows:

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

...

D.1.2 PM2.5 Non-attainment New Source Review Limit [326 IAC 2-1.1-5]

- (a) Pursuant to 326 IAC 2-1.1-5, the combined total PM2.5 emissions from the Crude Clay Department, EU-03a, EU-03b, EU-03c, EU-04 and EU-04d, which exhaust through stack S-21, shall not exceed 1.94 pounds per hour.
- (b) Pursuant to 326 IAC 2-1.1-5, PM2.5 emissions from the fire brick cutting operation, EU-06, which exhaust through S-12, shall not exceed 1.94 pounds per hour.

Compliance with these limits, combined with the potential to emit from all other emission units at this source, will limit the source wide combined total PM2.5 emissions to less than one hundred (100) tons per twelve (12) consecutive month period with compliance determined at the end of each month. Compliance with this limit renders the requirements of 326 IAC 2-1.1-5 (Non-attainment New Source Review) not applicable.

~~D.1.32~~ Particulate Matter (PM) Limitations [326 IAC 6.5]

~~D.1.43~~ Preventive Maintenance Plan [326 IAC 2-8-4(9)]

Compliance Determination Requirements

D.1.54 Particulate Matter (PM)

In order to comply with Conditions D.1.1, ~~and~~ D.1.2 **and D.1.3**, the baghouses for particulate matter (PM), **PM10 and PM2.5** control in EU-03a, EU-03b, EU-03c, EU-12, EU-13, IA-12, EU-06, EU-04 and EU-04d shall be in operation at all times emission units EU-03a, EU-03b, EU-03c, EU-12, EU-13, IA-12, EU-06, EU-04 and EU-04d are in operation.

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

D.1.65 Visible Emissions Notations

D.1.76 Parametric Monitoring

D.1.87 Broken or Failed Bag Detection

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

D.1.98 Record Keeping Requirement

- (a) To document compliance with Condition **D.1.6** ~~D.1.5~~, the Permittee shall maintain daily records of visible emission notations of S-21 and S-12 stack exhausts. The Permittee shall include in its daily records when a visible emission notation is not taken and the reason for the lack of visible emission notation (i.e. the process did not operate that day).
- (b) To document compliance with Condition **D.1.7** ~~D.1.6~~, the Permittee shall maintain daily records of the total static pressure drop across the baghouses identified in Condition **D.1.7** ~~D.1.6~~. The Permittee shall include in its daily records when a static pressure drop notation is not taken and the reason for the lack of static pressure drop notation (i.e. the process did not operate that day).
- (c) All records shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

**Indiana Department of Environmental Management
Office of Air Quality
and
City of Indianapolis
Office of Environmental Services**

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

Source Background and Description

Source Name:	American Art Clay Company, Incorporated
Source Location:	6060 North Guion Road, Indianapolis, Indiana 46254
County:	Marion
SIC Code:	3269, 3479 & 3499
Permit Renewal No.:	F097-26238-00514
Permit Reviewer:	M. Caraher

The Indiana Department of Environmental Management, Office of Air Quality (OAQ) and the City of Indianapolis, Office of Environmental Services (OES) have reviewed an operating permit renewal application from American Art Clay Company, Incorporated relating to the operation of a stationary source manufacturing clay and assembling kilns and potter's wheels.

History

On March 10, 2008, American Art Clay Company, Incorporated (hereafter referred to as AMACO) submitted an application to OAQ and OES requesting to renew its operating permit. AMACO was issued its initial FESOP, F097-18189-00514, on December 9, 2003.

Prior to the submission of the FESOP Renewal application, AMACO notified IDEM, OAQ and OES on September 25, 2007 to change the static pressure drop range in Condition D.1.6(c) and D.1.6(d) of F097-18189-00514 from 1.5 - 8.0 inches of water to 0.5 - 14.0 inches of water. The notification is combined into this FESOP Renewal. Additional information to support the change in static pressure drop range was submitted on December 31, 2007 and March 18, 2008.

During the review of this FESOP Renewal, AMACO submitted a request on June 3, 2008 to incorporate an existing Insignificant Activity, EU-04d, one (1) sack dump blender in the Crude Clay Department, into this FESOP Renewal. EU-04d is now combined into this FESOP Renewal.

Permitted Emission Units and Pollution Control Equipment

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

Clay Mixing and Fire Brick Cutting

Crude Clay Department:

- (a) One (1) clay mixing area identified as EU-03a, constructed in 2004, with a maximum capacity of 87,600 tons of dry crude clay per year, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21, and comprised of the following:
 - (1) Two (2) mixer-extruders; and
 - (2) One (1) crude clay bagger.
- (b) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03b (formerly part of EU-01) and mixing red clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per

- year; with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
- (c) One (1) five (5) pound crude clay bag fed mixer, identified as EU-03c and mixing white clay, constructed in 2004, with a maximum capacity of 3,548 tons of clay per year, installed in 2004, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21.
 - (d) Six (6) crude clay storage silos, identified as EU-12, constructed in 2004, with a maximum capacity of 175,200 tons per year of crude clay, with particulate emissions controlled by four (4) baghouses, identified as IP-2 through IP-5, and exhausting through stacks S-5 through S-8.
 - (e) Six (6) in-use silos, identified as EU-13, constructed in 2004, with a maximum capacity of 87,600 tons per year of clay, with particulate emissions controlled by two (2) baghouses, identified as IP-7 and IP-8, and exhausting through stacks S-10 and S-11.
 - (f) One (1) scale/pneumatic blender, identified as IA-12, constructed in 2004, with a maximum capacity of 87,600 tons per year of crude clay, with particulate emissions controlled by one (1) baghouse, identified as IP-6, and exhausting through stack S-9.

Kiln Department:

- (g) One (1) fire brick cutting operation, identified as EU-06, constructed in 2004 and modified in 2007, with a maximum capacity of 100 pounds of fire brick per hour, with particulate emissions controlled by one (1) baghouse, identified as CE-4, exhausting to stack S-12, and comprised of the following:
 - (1) Five (5) fire brick cutters;
 - (2) One (1) CNC fire brick router;
 - (3) One (1) fire brick shaper; and
 - (4) One (1) fire brick sander.

Surface Coating

- (h) One (1) kiln paint booth, identified as EU-07, constructed in 2004, with a maximum usage of 1.47 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-5, exhausting to stack S-13.
- (i) One (1) Brent paint booth, identified as EU-08, constructed in 2004, with a maximum usage of 4.32 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.
- (j) One (1) touch-up process for the Brent paint booth, identified as EU-08a, constructed in 2004, with a maximum usage of 1.12 gallons per hour, with particulate emissions controlled by fabric filters, identified as CE-6, exhausting to stack S-14.

Emission Units and Pollution Control Equipment Removed From the Source

There have been no emission units or pollution control equipment removed from the source.

Insignificant Activities

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

Crude Clay Department:

- (a) One (1) mixing operation, identified as EU-04, comprised of one (1) sack dump blender, constructed in 2004, with a maximum capacity of 1,500 tons per year of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]

Crude Clay Department:

- (b) One (1) mixing operation, identified as EU-04d, comprised of one (1) sack dump blender, receiving approval to construct in 2008, with a maximum capacity of 300 pounds per hour of dry clay, with particulate emissions controlled by one (1) baghouse, identified as CE-9, exhausting to stack S-21. [326 IAC 2-8][326 IAC 6.5-1-2]
- (c) Trimmers that do not produce fugitive emissions and that are equipped with a dust collection or trim material recovery device such as a bag filter or cyclone. [326 IAC 6.5-1-2]
- (d) Natural gas-fired combustion sources with a heat input capacity of less than ten million (10,000,000) British thermal units per hour: [326 IAC 6.5]
 - (1) One (1) Weil natural gas-fired boiler, identified as EU-11, with a maximum capacity of 1.15 million British thermal units per hour, exhausting to stack S-17; and
 - (2) Fifteen space heaters, identified as IA-11, one with a capacity of 2.5 MMBtu/hr, two with a capacity of 0.75 MMBtu/hr and twelve with a capacity of 0.15 MMBtu/hr and all burning only natural gas.
- (e) The following equipment related to manufacturing activities not resulting in the emission of HAPs: brazing equipment, cutting torches, soldering equipment, welding equipment:
 - (1) One (1) welding operation, identified as IA-8, with a maximum capacity of 1,621 tons of steel per year and 6 tons of welding wire per year, exhausting to general ventilation. [326 IAC 6.5-1-2]
- (f) Grinding and machining operations controlled with fabric filters, scrubbers, mist collectors, wet collectors and electrostatic precipitators with a design grain loading of less than or equal to 0.03 grains per actual cubic foot and a gas flow rate less than or equal to 4,000 actual cubic feet per minute, including the following: deburring, buffing, polishing, abrasive blasting, pneumatic conveying, and woodworking operations:
 - (1) One (1) woodworking operation, identified as IA-7, with a maximum capacity of 136 tons per year, exhausting through dust collectors to general ventilation. [326 IAC 6.5-1-2]
- (g) Emission units with PM and PM-10 emissions less than five (5) tons per year, SO₂, NO_x, and VOC emissions less than ten (10) tons per year, CO emissions less than twenty-five (25) tons per year, lead emissions less than two-tenths (0.2) tons per year, single HAP emissions less than one (1) ton per year, and combination of HAPs emissions less than two and a half (2.5) tons per year:
 - (1) One (1) leaded clay mixing area 1, identified as EU-01a, with a capacity of 800 tons of leaded glaze per year, particulate emissions controlled by a HEPA Filter identified as CE-10, and exhausting internally; [326 IAC 6.5-1-2]

- (2) Three (3) unleaded glaze mixers in one area identified as EU-01b, with a combined maximum capacity of 2,400 tons of unleaded glaze per year, with particulate emissions controlled by one (1) baghouse identified as CE-1, exhausting to stack S-1; [326 IAC 6.5-1-2]
 - (3) One (1) Sculpt-a-Mold batch mixer, identified as EU-05, receiving approval to construct in 2003, with a maximum capacity of 915 tons of paper mache powder per year, controlled by one (1) baghouse identified as CE-3, exhausting to stack S-3; [326 IAC 6.5-1-2]
 - (4) One (1) creastone mixing process, identified as IA-2, with a maximum capacity of 534 tons of creastone per year, controlled by one (1) baghouse identified as CE-3, and exhausting to stack S-3; [326 IAC 6.5-1-2]
 - (5) Two (2) wet mixers, identified as IA-3a and IA-3b, with a maximum capacity of 324 tons per year of chrysler clay or a capacity of 83 tons per year of floral clay, controlled by two (2) baghouses, identified as CE-8a and CE-8b and exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (6) One (1) modeling dough mixing operation, identified as IA-4, with a maximum capacity of 131 tons of flour and salt per year, exhausting to general ventilation; [326 IAC 6.5-1-2]
 - (7) One (1) miscellaneous dry materials repackaging operation, identified as IA-5, with a maximum capacity of 110 tons per year of powder glaze, exhausting to stack S-20; [326 IAC 6.5-1-2]
 - (8) One (1) Rub-N-Buff solvent mixing operation, identified as IA-9, with a maximum capacity of 84 tons per year of solvent and varnish, exhausting to general ventilation;
 - (9) One (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, with a maximum capacity of 13 tons per year of solvent, exhausting to general ventilation; and
 - (10) One (1) printing operation, identified as IA-10, with a maximum capacity of 2.5 tons of ink and washes per year, exhausting to general ventilation.
- (h) Filling drums, pails, or other packaging containers with lubricating oils, waxes, and greases.
 - (i) Water based adhesives that are less than or equal to 5% by volume of VOC, excluding HAPs.
 - (j) Replacement or repair of electrostatic precipitators, bags in baghouses, and filters in other filtration equipment.
 - (k) Blowdown for any of the following: sight glass, boiler, compressors, pumps, and cooling towers.
 - (l) Filter or coalescer media changeout.
 - (m) A laboratory as defined in 326 IAC 2-7-1(21)(D).
 - (n) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]
 - (o) Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6. [326 IAC 8-3-2][326 IAC 8-3-5]

Existing Approvals

Since the issuance of the initial FESOP, F097-18189-00514, on December 9, 2003, the source has constructed or has been operating under the following approvals as well:

- (a) First Minor Permit Revision No. 097-20023, issued on May 5, 2005;
- (b) First Administrative Amendment No. 097-22751, issued on April 6, 2006; and
- (c) Second Administrative Amendment No. 097-24450, issued on April 27, 2007.

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.

The following terms and conditions from previous approvals have been determined no longer applicable; therefore, were not incorporated into this FESOP Renewal:

- (a) All construction conditions from all previously issued permits.

Reason not incorporated: All facilities previously permitted have already been constructed. Therefore, the construction conditions are no longer necessary as part of the operating permit. Any facilities that were previously permitted but have not yet been constructed would need new pre-construction approval before beginning construction.

- (b) The parametric monitoring provisions for EU-12 and EU-13 in Condition D.1.6(c) and D.1.6(d) of F097-18189-00514 issued on December 9, 2003 as follows:

D.1.6 Parametric Monitoring

The Permittee shall record the total static pressure drop across the baghouses used in conjunction with EU-03a, EU-03b, EU-03c, EU-04, EU-06, ~~EU-12 and EU-13~~ at least once per day when EU-03a, EU-03b, EU-03c, EU-04, EU-06, ~~EU-12 and EU-13~~ are in operation and as stated below:

...

- ~~(c) For the Crude Clay Dept. Silo/Baghouses IP-2 through IP-5 (EU-12), the pressure drop across the baghouse should be in the "normal" manufacturer range of 1.5 to 8 inches of water or a range established during the latest stack test. When for any one reading the pressure drop across the baghouse is outside the "normal" range of operation, the Permittee shall take reasonable response steps in accordance with Section C - Compliance Response Plan - Failure to Take Response Steps. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Compliance Response Plan - Preparation, Implementation, Records, and Reports, shall be considered a deviation from this permit.~~

~~(d) For the Crude Clay Dept. Silo/Baghouses IP-7 and IP-8 (EU-13), the pressure drop across the baghouse should be in the "normal" manufacturer range of 1.5 to 8 inches of water or a range established during the latest stack test. When for any one reading the pressure drop across the baghouse is outside the "normal" range of operation, the Permittee shall take reasonable response steps in accordance with Section C Compliance Response Plan Failure to Take Response Steps. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C Compliance Response Plan Preparation, Implementation, Records, and Reports, shall be considered a deviation from this permit.~~

Reason not incorporated: PM10 emissions from the clay mixing area EU-03a, EU-03b, EU-03c, EU-04 and EU-04d shall not exceed 1.94 pounds of PM10 per hour from these operations. In addition, PM10 emissions from the fire brick cutting operation EU-06 shall not exceed 1.94 pounds of PM10 per hour. Therefore, parametric monitoring is required for EU-03a, EU-03b, EU-03c, EU-04, EU-04d and EU-06. The FESOP limit for PM10 emissions from this source is structured such that, when including PM10 emissions from all other operations at the source, source wide combined potential to emit PM10 remains less than one hundred (100) tons per year. Compliance with this FESOP limit renders the requirements of 326 IAC 2-7 (Part 70 Permit Program) not applicable. Therefore, parametric monitoring for EU-12 and EU-13 are no longer applicable. On September 25, 2007, AMACO submitted a FESOP Administrative Amendment application to change the pressure drop range for EU-12 and EU-13. The application request has been assigned the tracking number AA097-25340-00514. However, the request to change the pressure drop range is no longer needed.

Enforcement Issue

IDEM, OAQ and OES are aware that each baghouse in the Crude Clay Department is not in compliance with the compliance monitoring provisions of F097-18189-00514. IDEM, OAQ and OES are aware that an Emergency Reduction Plan, pursuant to 326 IAC 1-5-2 (Emergency Reduction Plans) and Condition C.14 of F097-18189-00514, was not submitted to IDEM, OAQ and OES until July 3, 2008. IDEM, OAQ and OES are reviewing this matter and will take appropriate action.

Emission Calculations

The calculations submitted by the applicant have been verified and found to be accurate and correct. These calculations are provided in Appendix A of this document.

County Attainment Status

The source is located in Marion County.

Pollutant	Designation
SO ₂	Better than national standards.
CO	Attainment effective February 18, 2000, for the part of the city of Indianapolis bounded by 11 th Street on the north; Capitol Avenue on the west; Georgia Street on the south; and Delaware Street on the east. Unclassifiable or attainment effective November 15, 1990, for the remainder of Indianapolis and Marion County.
O ₃	Attainment effective November 8, 2007, for the 8-hour ozone standard. ¹
PM10	Unclassifiable effective November 15, 1990.
NO ₂	Cannot be classified or better than national standards.
Pb	Attainment effective July 10, 2000, for the part of Franklin Township bounded by Thompson Road on the south; Emerson Avenue on the west; Five Points Road on the east; and Troy Avenue on the north.

Pollutant	Designation
	Attainment effective July 10, 2000, for the part of Wayne Township bounded by Rockville Road on the north; Girls School Road on the east; Washington Street on the south; and Bridgeport Road on the west. The remainder of the county is not designated.
	¹ Attainment effective October 18, 2000, for the 1-hour ozone standard for the Indianapolis area, including Marion County, and is a maintenance area for the 1-hour ozone National Ambient Air Quality Standards (NAAQS) for purposes of 40 CFR 51, Subpart X*. The 1-hour designation was revoked effective June 15, 2005. Basic Nonattainment effective April 5, 2005 for PM2.5.

- (a) Ozone Standards
- (1) On October 25, 2006, the Indiana Air Pollution Control Board finalized a rule revision to 326 IAC 1-4-1 revoking the one-hour ozone standard in Indiana.
 - (2) On November 9, 2007, the Indiana Air Pollution Control Board finalized a temporary emergency rule to re-designate Boone, Clark, Elkhart, Floyd, LaPorte, Hamilton, Hancock, Hendricks, Johnson, Madison, Marion, Morgan, Shelby, and St. Joseph as attainment for the 8-hour ozone standard.
 - (3) Volatile organic compounds (VOC) and Nitrogen Oxides (NOx) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NOx emissions are considered when evaluating the rule applicability relating to ozone. Marion County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (b) PM2.5
 Marion County has been classified as nonattainment for PM2.5 in 70 FR 943 dated January 5, 2005. Until U.S. EPA adopts specific New Source Review rules for PM2.5 emissions, it has directed states to regulate PM10 emissions as a surrogate for PM2.5 emissions pursuant to the requirements of Nonattainment New Source Review, 326 IAC 2-1.1-5.
- (c) Other Criteria Pollutants
 Marion County has been classified as attainment or unclassifiable in Indiana for SO₂, CO, NO₂ and Lead. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (d) Fugitive Emissions
 Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2, fugitive emissions are not counted toward the determination of PSD applicability.

Unrestricted Potential Emissions

This table reflects the unrestricted potential emissions of the source.

Pollutant	tons/year
PM	195.98
PM10	120.06
SO ₂	0.02
VOC	73.62
CO	2.56
NO _x	3.04

HAPs	tons/year
Xylene	6.35
Toulene	6.13
MEK	3.96
Hexane	0.06
Lead	0.03
Total	16.50

- (a) The potential to emit (as defined in 326 IAC 2-7-1(29)) of PM10 is still equal to or greater than 100 tons per year. The source is subject to the provisions of 326 IAC 2-7. However, the source has agreed to continue to limit their PM10 emissions to less than Title V levels. Therefore the source will be issued a FESOP Renewal.
- (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.
- (d) Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-7, fugitive emissions are not counted toward the determination of Part 70 applicability.

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 (tons/year)							
	PM	PM10*	SO ₂	VOC	CO	NO _x	Highest Single HAP	Combined HAP
EU-03a, b,c & EU-04 & EU-04d (clay mixing areas)	51.36	8.5 *	negl.	negl.	negl.	negl.	negl.	negl.
EU-12 (Six (6) crude clay storage silos)	30.95	21.59	negl.	negl.	negl.	negl.	negl.	negl.
EU-13 (Six (6) in-use silos)	15.48	13.15	negl.	negl.	negl.	negl.	negl.	negl.
IA-12 (scale/pneumatic blender)	15.48	13.15	negl.	negl.	negl.	negl.	negl.	negl.
EU-06 (fire brick cutting)	27.03	8.5 *	negl.	negl.	negl.	negl.	negl.	negl.
EU-07 (kiln paint booth)	7.76	1.56	negl.	35.24	negl.	negl.	4.76	5.74
EU-08 (Brent paint booth)	36.97	7.44	negl.	16.71	negl.	negl.	negl.	negl.
EU-08a (touch-up paint booth)	0.96	0.19	negl.	17.31	negl.	negl.	6.07	10.60
Degreasing	negl.	negl.	negl.	0.53	negl.	negl.	negl.	negl.
EU-11 (Weil boiler) & IA-11 (space heaters)	0.06	0.23	0.02	0.17	2.56	3.04	0.05	0.05
IA-8 (welding)	0.03	0.03	negl.	negl.	negl.	negl.	negl.	negl.
IA-7 (woodworking)	0.17	0.07	negl.	negl.	negl.	negl.	negl.	negl.
EU-01a	1.58	1.34	negl.	negl.	negl.	negl.	0.03	0.03

Process/ Emission Unit	Potential To Emit (tons/year)							Highest Single HAP	Combined HAP
	PM	PM10*	SO ₂	VOC	CO	NO _x			
(leaded clay mixing)									
EU-01b (unleaded glaze mixers)	3.94	3.35	negl.	negl.	negl.	negl.	negl.	negl.	negl.
EU-05 & IA-2 (sculpt-a-mold mixer & creastone mixing)	2.45	1.18	negl.	negl.	negl.	negl.	negl.	negl.	negl.
IA-3a & IA-3b (two (2) wet mixers)	1.05	0.89	negl.	negl.	negl.	negl.	negl.	negl.	negl.
IA-4 (modeling dough mixer)	0.39	0.09	negl.	negl.	negl.	negl.	negl.	negl.	negl.
IA-5 (dry repackaging)	0.32	0.28	negl.	negl.	negl.	negl.	negl.	negl.	negl.
IA-9 (solvent mixing)	negl.	negl.	negl.	2.23	negl.	negl.	0.07	0.07	0.07
IA-10 (printing)	negl.	negl.	negl.	1.42	negl.	negl.	negl.	negl.	negl.
Title V Major Source Thresholds	NA	100	100	100	100	100	10	25	
PSD & Nonattainment NSR Major Source Thresholds	250	100	250	250	250	250	NA	NA	
Total Emissions	195.98	<100.0	0.02	73.62	2.56	3.04	6.35	16.50	
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". US EPA has directed states to regulate PM10 emissions as surrogate for PM2.5 emissions.									

* PM10 from these units is limited to 1.94 pounds per hour such that the limited potential to emit from these units when combined with the potential to emit PM10 from all other emission units at the source is less than one hundred (100) tons per twelve (12) consecutive month period and renders the requirements of 327 IAC 2-7 (Part 70 Permit Program) not applicable (see 326 IAC 2-8 discussion).

- (a) This existing stationary source is not major for PSD because the emissions of each criteria pollutant are less than two hundred fifty (<250) tons per year, and it is not one of the twenty-eight (28) listed source categories.
- (b) This existing source is not a major stationary source, under nonattainment new source review rules (326 IAC 2-1.1-5) since PM10 (a surrogate for PM2.5) is not emitted at a rate of 100 tons per year or more.
- (c) Fugitive Emissions
 Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2 or 326 IAC 2-3, fugitive emissions are not counted toward the determination of PSD applicability.

Federal Rule Applicability

- (a) There are no New Source Performance Standards (NSPS) (326 IAC 12 and 40 CFR Part 60) included in the permit for this source.
- (b) This source is not subject to the provisions of the National Emission Standards for Hazardous Air Pollutants for Clay Ceramics Manufacturing, 40 CFR Part 63, Subpart KKKKK, because this source is not a major HAP source.

- (c) This source is not subject to the provisions of the National Emission Standards for Hazardous Air Pollutants for Area Sources: Clay Ceramics Manufacturing, Glass Manufacturing and Secondary Nonferrous Metals Processing, 40 CFR Part 63, Subpart RRRRRR, because this area source does not have an atomized glaze spray booth and does not have a kiln that fires glazed ceramic ware.
- (d) This source is not subject to the provisions of the National Emission Standards for Hazardous Air Pollutants: Surface Coating of Miscellaneous Metal Parts & Products, 40 CFR Part 63, Subpart MMMM, because this source is not a major HAP source.
- (e) This source is not subject to the provisions of the National Emission Standards for Hazardous Air Pollutants: Paint Stripping and Miscellaneous Surface Coating Operations at Area Sources, 40 CFR Part 63, Subpart HHHHHH, because this area source does not utilize methylene chloride in paint stripping, does not spray paint coatings containing target HAP and does not surface coat motor vehicles or mobile equipment.
- (f) This source is not subject to the provisions of the National Emission Standards for Hazardous Air Pollutants: Halogenated Solvent Cleaning, 40 CFR Part 63, Subpart T, because this source is not a major HAP source.
- (g) There are no National Emission Standards for Hazardous Air Pollutants (NESHAP) (326 IAC 14, 326 IAC 20 and 40 CFR Part 63) included in the permit for this source.
- (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 2-1.1-5 (Non-attainment New Source Review)
Marion County has been designated as nonattainment for PM_{2.5}. According to an EPA guidance memo dated April 5, 2005, PM₁₀ is to be utilized as a surrogate for PM_{2.5} until the EPA can promulgate the PM_{2.5} implementation rule. PM₁₀ emissions, and therefore PM_{2.5} emissions, from this source are less than one hundred (100) tons per twelve consecutive month period. There have been no modifications to this source such that it is a major source of PM₁₀ emissions. Therefore, this source is not subject to nonattainment new source review requirements for PM_{2.5} emissions.
- (b) 326 IAC 2-2 (Prevention of Significant Deterioration (PSD) Requirements)
This source is not a major stationary source because no attainment regulated pollutant emissions are equal to or greater than two hundred fifty (250) tons per year and this source is not one of the 28 listed source categories under 326 IAC 2-2. There have been no modifications or revisions to this source that were major modifications pursuant to 326 IAC 2-2. Therefore, 326 IAC 2-2 (Prevention of Significant Deterioration (PSD) Requirements) is not applicable to the source.
- (c) 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants (HAP))
The potential to emit of any single HAP is less than ten (10) tons per year and the potential to emit of a combination of HAPs is less than twenty-five (25) tons per year. Therefore, this source is an area source under Section 112 of the Clean Air Act (CAA) and is not subject to the provisions of 326 IAC 2-4.1.
- (d) 326 IAC 2-6 (Emission Reporting)
Pursuant to 326 IAC 2-6-1, this source is not subject to this rule, because it is not required to have an operating permit under 326 IAC 2-7 (Part 70), it is not located in

Lake, Porter, or LaPorte County, and it does not emit lead into the ambient air at levels equal to or greater than 5 tons per year. Therefore, 326 IAC 2-6 does not apply.

- (e) 326 IAC 2-8 (Federally Enforceable State Operating Permit Program (FESOP))
The unrestricted source wide potential to emit PM10 is greater than one hundred (100) tons per year. Emission unit EU-03a, b & c, emission units EU-04 and EU-04d in the clay mixing department each exhausts to the same baghouse identified as CE-9. Emission unit EU-06 in the kiln department exhausts to baghouse CE-4. By limiting combined PM10 emissions after baghouse emission control from emission unit EU-03a, b & c, emission unit EU-04 and EU-04d to 1.94 pounds of PM10 per hour, and by limiting PM10 emissions after baghouse emission control from emission unit EU-6 to 1.94 pounds of PM10 per hour, the potential to emit PM10, when combined with the potential to emit PM10 from all other emission units at this source, limits the potential to emit PM10 to less than one hundred (100) tons per twelve (12) consecutive month period with compliance determined at the end of each month (see Appendix A pages 1 and 9). Therefore, the requirements of 326 IAC 2-7 (Part 70 Permit Program) do not apply.
- (f) 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 Exemptions), opacity shall meet the following, unless otherwise stated in the permit:
 - (1) Opacity shall not exceed an average of thirty percent (30%) 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.
- (g) 326 IAC 6-3 (Particulate Emission Limitations for Manufacturing Processes)
Pursuant to 326 IAC 6-3-1(c)(3), this rule shall not apply if a particulate matter limitation established in 326 IAC 6.5 concerning particulate matter emissions is more stringent than the particulate matter limitation established in this rule. This source has the potential to emit one hundred (100) tons or more of particulate matter per year. Therefore, all particulate matter emitting units at this source are subject to 326 IAC 6.5 (Fugitive Particulate Matter Emission Limitations)
- (h) 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.
- (i) 326 IAC 6-5 (Fugitive Particulate Matter Emission Limitations)
The source is not subject to the requirements of 326 IAC 6-5, because the source does not have potential fugitive particulate emissions greater than twenty five (25) tons per year. Therefore, 326 IAC 6-5 does not apply.
- (j) 326 IAC 8-1-6 (New Facilities: General Reduction Requirements)
None of the emission units at this source, not otherwise regulated by other provisions of 326 IAC 8 (Volatile Organic Compound Rules), is subject to the requirements of 326 IAC 8-1-6, since the unlimited potential to emit of VOC from each emission unit is less than twenty-five (25) tons per year (see Appendix A page 9).

- (k) 326 IAC 11 (Emission Limitations for Specific Types of Operations)
This clay manufacturing operation does not perform any specific type of operation identified in 326 IAC 11 (Emission Limitations for Specific Types of Operations). Therefore, this source is not subject to 326 IAC 11.
- (l) 326 IAC 12 (New Source Performance Standards)
See the Federal Rule Applicability section above.
- (m) 326 IAC 14 (Emission Standards for Hazardous Air Pollutants)
See the Federal Rule Applicability section above.
- (n) 326 IAC 20 (Hazardous Air Pollutants)
See the Federal Rule Applicability section above.

State Rule Applicability – Individual Facilities

EU-03a, b & c, EU-12, EU-13, IA-12, EU-06, EU-07, EU-08, EU-08a, IA-11, trimmers, IA-8, IA-7, EU-01a, EU-01b, EU-05, IA-2, IA-3a, IA-3b, IA-4, IA-5, EU-04 and EU-04d

- (a) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
This source has the potential to emit one hundred (100) tons or more of particulate matter per year. Pursuant to this rule, particulate matter emissions from EU-03a, b & c, EU-12, EU-13, IA-12, EU-06, EU-07, EU-08, EU-08a, IA-11, trimmers, IA-8, IA-7, EU-01a, EU-01b, EU-05, IA-2, IA-3a, IA-3b, IA-4, IA-5, EU-04 and EU-04d shall each not exceed 0.03 grains per dry standard cubic foot (gr/dcsf) of exhaust air.

EU-07, EU-08 and EU-08a

- (a) 326 IAC 8-2-9 (Surface Coating Emission Limitations: Miscellaneous Metal Coating Operations)
The kiln paint booth, identified as EU-07, has potential VOC emissions of greater than fifteen (15) pounds per day (see Appendix A page 2). However, AMACO does not have actual VOC emissions of greater than fifteen (15) pounds per day and has agreed to limit actual VOC emissions to less than fifteen (15) pounds per day such that EU-07 is not subject to the requirements of 326 IAC 8-2-9.

The touch up booth for the Brent paint booth, identified as EU-08a, has potential VOC emissions of greater than fifteen (15) pounds per day (see Appendix A page 3). However, AMACO does not have actual VOC emissions of greater than fifteen (15) pounds per day and has agreed to limit actual VOC emissions to less than fifteen (15) pounds per day such that EU-08a is not subject to the requirements of 326 IAC 8-2-9.

The Brent paint booth, identified as EU-08, is subject to the requirements of 326 IAC 8-2-9 because construction of EU-08 commenced after July 1, 1990 and EU-08 has actual VOC emissions of greater than fifteen (15) pounds per day. Pursuant to 326 IAC 8-2-9 (Surface Coating Emission Limitations: Miscellaneous Metal Coating Operations), the volatile organic compound (VOC) content of the coating delivered to the applicator at EU-08 shall be limited to 3.5 pounds of VOCs per gallon of coating less water, for air dried coatings. Solvent sprayed from application equipment during cleanup or color changes shall be directed into containers. Such containers shall be closed as soon as such solvent spraying is complete, and the waste solvent shall be disposed of in such a manner that evaporation is minimized. Based on the MSDS submitted by the source and calculations made (see Appendix A page 3), EU-08 can comply with this requirement.

Degreasing Operations

- (a) 326 IAC 8-3-2 (Cold Cleaner Operations)
Pursuant to 326 IAC 8-3-2 (Cold Cleaner Operations), for cold cleaning operations constructed after January 1, 1980, the owner or operator shall:
- (1) Equip the cleaner with a cover;
 - (2) Equip the cleaner with a facility for draining cleaned parts;
 - (3) Close the degreaser cover whenever parts are not being handled in the cleaner;
 - (4) Drain cleaned parts for at least fifteen (15) seconds or until dripping ceases;
 - (5) Provide a permanent, conspicuous label summarizing the operation requirements; and
 - (6) Store waste solvent only in covered containers and not dispose of waste solvent or transfer it to another party, in such a manner that greater than twenty percent (20%) of the waste solvent (by weight) can evaporate into the atmosphere.
- (b) 326 IAC 8-3-5(a) (Cold Cleaner Degreaser Operation and Control)
Pursuant to 326 IAC 8-3-5(a) (Cold Cleaner Degreaser Operation and Control), the owner or operator of a cold cleaner degreaser facility, construction of which commenced after July 1, 1990, shall ensure that the following control equipment requirements are met:
- (1) Equip the degreaser with a cover. The cover must be designed so that it can be easily operated with one (1) hand if:
 - (A) The solvent volatility is greater than two (2) kiloPascals (fifteen (15) millimeters of mercury or three-tenths (0.3) pounds per square inch) measured at thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F));
 - (B) The solvent is agitated; or
 - (C) The solvent is heated.
 - (2) Equip the degreaser with a facility for draining cleaned articles. If the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury) or six-tenths (0.6) pounds per square inch) measured at thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F)), then the drainage facility must be internal such that articles are enclosed under the cover while draining. The drainage facility may be external for applications where an internal type cannot fit into the cleaning system.
 - (3) Provide a permanent, conspicuous label which lists the operating requirements outlined in subsection (b).
 - (4) The solvent spray, if used, must be a solid, fluid stream and shall be applied at a pressure which does not cause excessive splashing.
 - (5) Equip the degreaser with one (1) of the following control devices if the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury) or six-tenths (0.6) pounds per square inch) measured at

thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F)), or if the solvent is heated to a temperature greater than forty-eight and nine-tenths degrees Celsius (48.9°C) (one hundred twenty degrees Fahrenheit (120°F)):

- (A) A freeboard that attains a freeboard ratio of seventy-five hundredths (0.75) or greater.
 - (B) A water cover when solvent is used is insoluble in, and heavier than, water.
 - (C) Other systems of demonstrated equivalent control such as a refrigerated chiller of carbon adsorption. Such systems shall be submitted to the U.S. EPA as a SIP revision.
- (c) 326 IAC 8-3-5(b) (Cold Cleaner Degreaser Operation and Control)
Pursuant to 326 IAC 8-3-5(b) (Cold Cleaner Degreaser Operation and Control), the Permittee shall ensure that the following operating requirements are met:
- (1) Close the cover whenever articles are not being handled in the degreaser.
 - (2) Drain cleaned articles for at least fifteen (15) seconds or until dripping ceases.
 - (3) Store waste solvent only in covered containers and prohibit the disposal or transfer of waste solvent in any manner in which greater than twenty percent (20%) of the waste solvent by weight could evaporate.

EU-11

- (a) 326 IAC 6.5-1-2(b)(3) (Particulate Matter Limitations Except Lake County)
This source has the potential to emit one hundred (100) tons or more of particulate matter per year. Pursuant to this rule, particulate matter emissions from EU-11, the one (1) Weil natural gas fired boiler, shall not discharge a particulate matter content greater than one-hundredth (0.01) grain per dry standard cubic foot of exhaust air when firing natural gas.
- (b) 326 IAC 6-2 (Particulate Emission Limitations for Sources of Indirect Heating)
EU-11, the one (1) Weil natural gas fired boiler, is not subject to 326 IAC 6-2 because it is subject to 326 IAC 6.5 (Particulate Matter Limitations Except Lake County).
- (c) 326 IAC 7 (Sulfur Dioxide Emission Limitations)
EU-11, the one (1) Weil natural gas fired boiler, is not subject to 326 IAC 7 because EU-11 does not have the potential to emit sulfur dioxide of twenty five (25) tons per year or more.

IA-9

- (a) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
The one (1) Rub-N-Buff and the one (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, is not subject to the requirements of 326 IAC 6.5 because emission unit IA-9 does not have particulate emissions(see Appendix A page 7).
- (b) 326 IAC 8-1-6 (New Facilities: General Reduction Requirements)
The one (1) Rub-N-Buff and the one (1) Brush-N-Leaf solvent mixing operation, identified as IA-9, is not subject to the requirements of 326 IAC 8-1-6 because the unlimited potential to emit of VOC from IA-9 is less than twenty-five (25) tons per year (see Appendix A page 9).

IA-10

- (a) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
The one (1) printing operation, identified as IA-10, is not subject to the requirements of 326 IAC 6.5 because emission unit IA-10 does not have particulate emissions (see Appendix A page 8).
- (b) 326 IAC 8-2-5 (Paper Coating Operations)
The one (1) printing operation, identified as IA-10, is not subject to the requirements of 326 IAC 8-2-5 because emission unit IA-10 does not have actual VOC emissions of greater than fifteen (15) pounds per day (see Appendix A page 8).
- (c) 326 IAC 8-5-5 (Graphic Arts Operations)
The one (1) printing operation, identified as IA-10, is not subject to the requirements of 326 8-5-5 because emission unit IA-10 does not have the potential to emit VOC of greater than twenty-five (25) tons per year (see Appendix A page 8).

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, and OES, 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) AMACO has applicable compliance determination conditions as specified below:
 - (1) The baghouses for particulate control shall be in operation and control emissions from EU-03a, EU-03b, EU-03c, EU-05, EU-04, EU-04d, EU-06, EU-12, EU-13, IA-2, IA-3a, IA-3b, IA-4, IA-5, IA-7, IA-12, EU-01a, EU-01b at all times that the EU-03a, EU-03b, EU-03c, EU-05, EU-04, EU-04d, EU-06, EU-12, EU-13, IA-2, IA-3a, IA-3b, IA-4, IA-5, IA-7, IA-12, EU-01a, EU-01b are in operation.
 - (2) Compliance with 326 IAC 8-2-9 for EU-07, EU-08 and EU-08a shall be determined pursuant to 326 IAC 8-1-4(a)(3) and 326 IAC 8-1-2(a) by preparing or obtaining from the manufacturer the copies of the "as supplied" and "as applied" VOC data sheets. IDEM, OAQ and OES reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.
 - (3) Compliance with 326 IAC 6.5-1 for EU-07, EU-08 and EU-08a shall be demonstrated by having dry filters in place and controlling particulate emissions at all times EU-07, EU-08 and EU-08a are in operation.

(b) AMACO has applicable compliance monitoring requirements as specified below:

Emission Unit	Control	Parameter	Frequency	Range	Excursions and Exceedances
EU-03a,b &c, EU-04 & EU-04d	Baghouse CE-9	Pressure Drop	Once per day	2.5 to 4.1 inches	Response Steps
		Visible Emissions		Normal- Abnormal	
EU-06	Baghouse CE-4	Pressure Drop	Once per day	2.5 to 4.1 inches	Response Steps
		Visible Emissions		Normal- Abnormal	
EU-07, EU-08 & EU-08a	Dry filters	Placement, integrity & particle loading	Once per day	Condition exists to result in a response step	Response Steps

These conditions are necessary because the baghouses and dry filters for EU-03a, EU-03b, EU-03c, EU-05, EU-04, EU-04d, EU-06, EU-12, EU-13, IA-2, IA-3a, IA-3b, IA-4, IA-5, IA-7, IA-12, EU-01a, EU-01b, EU-07, EU-08 and EU-08a must be in operation and operate properly to ensure compliance with 326 IAC 2-8 (FESOP) and 326 IAC 6.5-1 (Particulate Matter Limitations Except Lake County).

Recommendation

The staff recommends to the Administrator that the FESOP Renewal be approved. This recommendation is based on the following facts and conditions:

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 March 10, 2008. Additional information was received on May 13, 2008. The application request received September 25, 2007 to change the static pressure drop range is combined into this FESOP Renewal F097-26238-00514.

Conclusion

The operation of this stationary source manufacturing clay and assembling kilns and potter's wheels shall be subject to the conditions of the attached FESOP Renewal No. F097-26238-00514.

OES Contact

- (a) Questions regarding this proposed permit can be directed to Mark Caraher at the City of Indianapolis Office of Environmental Services, 2700 South Belmont Avenue, Indianapolis, Indiana 46221 or by telephone at (317) 327-2272.
- (b) A copy of the findings is available on the Internet at: 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

Appendix A: Emissions Calculations
Clay Mixing & Fire Brick Cutting
Company Name: American Art Clay Company, Inc.
Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
Permit Number: F097-26238-00514
Pit ID: 097-00514
Reviewer: M. Caraher
Date: 5/8/2008

Crude Clay Department & Kiln Department

Emission Unit		Operation	Control Device	Outlet Grain Loading (gr/acf)	Air Flow Rate (acfm)	Control Efficiency (%)	PM10 Content (%)	Uncontrolled PM Emissions (ton/yr)	Uncontrolled PM10 Emissions (ton/yr)	Controlled PM Emissions (ton/yr)	Controlled PM10 Emissions (ton/yr)	Lead Uncontrolled Emissions (ton/yr)	Lead Controlled Emissions (ton/yr)
Significant Activity	Insignificant Activity												
No	EU-01a	Clay Mix Area1 (Leaded Glaze)	CE-10	0.0006	2,100	97%	85%	1.58	1.34	0.05	0.04	0.03	0.0009
No	EU-01b	Clay Mix Area1 (Unleaded Glaze)	CE-1	0.0005	2,100	99%	85%	3.94	3.35	0.04	0.03		
EU-03a,b,c	EU-04 & EU-04d	Clay Mixing	CE-9	0.00114	12,000	99%	85%	51.36	43.65	0.51	0.44		
No	EU-05 & IA-2	Sculpt-a-Mold & Creastone	CE-3	0.00056	3,500	97%	48%	2.45	1.18	0.07	0.04		
EU-06	No	Brick Cutting	CE-4	0.008	2,700	97%	44%	27.03	11.84	0.81	0.36		
No	IA-3a	Wet Mixing	CE-8a	0.002	700	90%	85%	0.53	0.45	0.05	0.04		
No	IA-3b	Wet Mixing	CE-8b	0.002	700	90%	85%	0.53	0.45	0.05	0.04		

METHODOLOGY

Uncontrolled PM Emissions (ton/yr) = Outlet Grain Loading (gr/acf) * Air Flow (acfm) * 60 (min/hr) * 8760 (hr/yr) / 7000 (gr/lb) / 2000 (lb/ton) / (1-Control Efficiency)

Uncontrolled PM10 Emissions (ton/yr) = Uncontrolled PM Emissions (ton/yr) * PM10 Content (%)

Controlled PM Emissions (ton/yr) = Uncontrolled PM Emissions (ton/yr) * (1-Control Efficiency)

Controlled PM10 Emissions (ton/yr) = Uncontrolled PM10 Emissions (ton/yr) * (1-Control Efficiency)

PM10 Content is from AP-42 Appendix B.2 Table B.2.2, Category 4 for all but brick cutting. PM10 content for the brick cutting is from AP-42 Appendix B.1,

Section 10.5 for belt sanding and P-42 Appendix B.2 Table B.2.2.

Control efficiency is worst case efficiency as stated in the permit application for baghouse control.

Emission Unit		Operation	Control Device	Maximum Throughput (ton/yr)	Controlled PM Emission Factor (lb/ton)	Controlled PM Emissions (ton/yr)	PM10 Content (%)	Controlled PM10 Emissions (ton/yr)	Control Efficiency (%)	Uncontrolled PM Emissions (ton/yr)	Uncontrolled PM10 Emissions (ton/yr)
Significant Activity	Insignificant Activity										
EU-12	No	Crude clay storage silos	IP-2	43,800	0.0106	0.23	24%	0.06	97%	7.74	1.86
EU-12	No	Crude clay storage silos	IP-3	43,800	0.0106	0.23	85%	0.20	97%	7.74	6.58
EU-12	No	Crude clay storage silos	IP-4	43,800	0.0106	0.23	85%	0.20	97%	7.74	6.58
EU-12	No	Crude clay storage silos	IP-5	43,800	0.0106	0.23	85%	0.20	97%	7.74	6.58
IA-12	No	Scale/Pneumatic Blender	IP-6	87,600	0.0106	0.46	85%	0.39	97%	15.48	13.15
EU-13	No	In-use Silos	IP-7	43,800	0.0106	0.23	85%	0.20	97%	7.74	6.58
EU-13	No	In-use Silos	IP-8	43,800	0.0106	0.23	85%	0.20	97%	7.74	6.58

Note: Emission factors from AP-42 Section 11.26-1. They are emission factors after a fabric filter.

PM10 Content is from AP-42 Figure 11.26-2 for IP-2 and from AP-42 Appendix B.2 Table B.2.2 for the others

METHODOLOGY

Controlled PM Emissions (ton/yr) = Controlled PM Emission Factor (lb/ton) * Maximum Throughput (ton/yr) / 2000 (lb/ton)

Controlled PM10 Emission (ton/yr) = Controlled PM Emissions (ton/yr) * PM10 Content (%)

Uncontrolled PM Emissions (ton/yr) = Controlled PM Emission (ton/yr) / (1-Control Efficiency)

Uncontrolled PM10 Emissions (ton/yr) = Controlled PM10 Emission (ton/yr) / (1-Control Efficiency)

Control efficiency is worst case efficiency as stated in the permit application for baghouse control.

Emission Unit		Operation	Maximum Throughput (ton/yr)	PM Emission Factor (lb/ton)	Uncontrolled PM Emissions (ton/yr)	PM10 Content (%)	Uncontrolled PM10 Emissions (ton/yr)
Significant Activity	Insignificant Activity						
No	IA-4	Dough Mixing	131	5.9	0.39	24%	0.09
No	IA-5	Repackaging Operation	110	5.9	0.32	85%	0.28
No	IA-3a & b	Floral Clay Mixing*	83	5.9	0.24	85%	0.21
No	IA-7	Woodworking	136	2.5	0.17	44%	0.07

METHODOLOGY

PM10 Content is from AP-42 Figure 11.26-2 for EU-05 and IA-4 and from AP-42 Appendix B.2 Table B.2.2 for IA-5 and IA-6.

PM10 content for IA-7 is from AP-42 Appendix B.1, Section 10.5 for belt sanding and AP-42 Appendix B.2 Table B.2.2.

Uncontrolled PM Emissions (ton/yr) = Maximum Throughput (ton/yr) * PM Emission Factor (lb/ton) / 2000 (lb/ton)

Uncontrolled PM10 Emissions (ton/yr) = Uncontrolled PM Emissions * PM10 Content (%)

Note: *Floral Clay Mixing is done on equipment used for Chrysler clay in IA-3a & b. Worst case emissions for all pollutants are when making Chrysler Clay in IA-3a & b.

Control efficiency is worst case efficiency as stated in the permit application for baghouse control.

Appendix A: Emissions Calculations

Surface Coating in EU-07

Company Name: American Art Clay Company, Inc.
 Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
 Permit Number: F097-26238-00514
 Plt ID: 097-00514
 Reviewer: M. Caraher
 Date: 5/8/2008

Material	Density (Lb/Gal)	Weight % Volatile (H2O & Organics)	Weight % Water	Weight % Organics	Volume % Water	Volume % Non-Volatiles (solids)	Gal of Mat. (gal/unit)	Maximum (unit/hour)	Pounds VOC per gallon of coating less water	Pounds VOC per gallon of coating	Potential VOC pounds per hour	Potential VOC pounds per day	Potential VOC tons per year	PM Potential (ton/yr)	PM10 Content** (%)	PM10 Potential (ton/yr)	lb VOC/gal solids	Transfer Efficiency
Heat Resistant Aluminum	7.08	68.00%	0.00%	68.00%	0.00%	19.82%	0.31000	3.000	4.81	4.81	4.48	107.46	19.61	3.23	20%	0.65	24.29	65%
High Heat Enamel Black	9.66	43.30%	0.00%	43.30%	0.00%	30.39%	0.18000	3.000	4.18	4.18	2.26	54.21	9.89	4.53	20%	0.91	13.76	65%
Xylene*	7.16	100.00%	0.00%	100.00%	0.00%	0.00%	0.06100	3.000	7.16	7.16	1.31	31.45	5.74	0.00	20%	0.00	NA	65%
Total													35.24	7.76		1.56		

*Note that Xylene is used for thinning and for gun cleaning.

**PM10 content is from AP-42 Appendix B.1 Section 4.2.2.8 and Table B.2-3

Filter Control Efficiency = 95%. Controlled particulate emissions = 0.39 ton/yr

METHODOLOGY

Pounds of VOC per Gallon Coating less Water = (Density (lb/gal) * Weight % Organics) / (1-Volume % water)

Pounds of VOC per Gallon Coating = (Density (lb/gal) * Weight % Organics)

Potential VOC Pounds per Hour = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr)

Potential VOC Pounds per Day = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (24 hr/day)

Potential VOC Tons per Year = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (8760 hr/yr) * (1 ton/2000 lbs)

Particulate Potential Tons per Year = (units/hour) * (gal/unit) * (lbs/gal) * (1- Weight % Volatiles) * (1-Transfer efficiency) * (8760 hrs/yr) * (1 ton/2000 lbs)

Pounds VOC per Gallon of Solids = (Density (lbs/gal) * Weight % organics) / (Volume % solids)

Total = Worst Coating + Sum of all solvents used

Material	Density (Lb/Gal)	Gallons of Material (gal/unit)	Maximum (unit/hour)	Weight % Toluene	Weight % Ethyl Benzene	Weight % Xylene	Toluene Emissions (ton/yr)	MEK Emissions (ton/yr)	Xylene Emissions (ton/yr)
Heat Resistant Aluminum	7.08	0.31000	3.000	0.00%	0.00%	0.00%	0.00	0.00	0.00
High Heat Enamel Black	9.66	0.18000	3.000	0.00%	0.00%	0.00%	0.00	0.00	0.00
Xylene	7.16	0.06100	3.000	1.00%	16.00%	83.00%	0.06	0.92	4.76
Total							0.06	0.92	4.76

METHODOLOGY

HAPS emission rate (tons/yr) = Density (lb/gal) * Gal of Material (gal/unit) * Maximum (unit/hr) * Weight % HAP * 8760 hrs/yr * 1 ton/2000 lbs

Appendix A: Emissions Calculations
Surface Coating in EU-8 and EU-8a
Company Name: American Art Clay Company, Inc.
Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
Permit Number: F097-26238-00514
Plt ID: 097-00514
Reviewer: M. Caraher
Date: 5/8/2008

Material	Density (Lb/Gal)	Weight % Volatile (H2O & Organics)	Weight % Water	Weight % Organics	Volume % Water	Volume % Non-Volatiles (solids)	Gal of Mat. (gal/unit)	Maximum (unit/hour)	Pounds VOC per gallon of coating less water	Pounds VOC per gallon of coating	Potential VOC pounds per hour	Potential VOC pounds per day	Potential VOC tons per year	PM Potential (ton/yr)	PM10 Content (%)***	PM10 Potential (ton/yr)	lb VOC/gal solids	Transfer Efficiency
Paint Booth																		
<i>Water-Based Paints*</i>																		
Black Satin W/B	9.16	42.20%	33.70%	8.50%	33.70%	35.56%	0.27000	16.000	1.17	0.78	3.36	80.73	14.73	35.06	20%	7.05	2.19	65%
Aluminum Coating - W/B	8.33	72.48%	64.30%	8.18%	64.30%	25.19%	0.27000	16.000	1.91	0.68	2.94	70.65	12.89	15.18	20%	3.05	2.71	65%
<i>Clean-up</i>																		
Acetone**																		
<i>Metal Prep</i>																		
Hydroforce Cleaner	8.91	74.30%	65.00%	9.30%	69.53%	0.00%	0.03400	16.000	2.72	0.83	0.45	10.82	1.97	1.91	20%	0.38	NA	65%
Total													16.71	36.97	20%	7.44		
Paint Booth Touch-up																		
<i>Aerosol for Touch-up Only</i>																		
Statin Black (Aerosol)	6.19	91.00%	34.00%	57.00%	31.99%	10.00%	0.07000	16.000	5.19	3.53	3.95	94.84	17.31	0.96	20%	0.19	35.28	65%
Total													17.31	0.96		0.19		

*Note that only one of the water-based paints can be used at a time. For this reason, only the paint with the worst-case emissions was used to determine the potential to emit from EU-08.

**Note that acetone is an exempt solvent and is therefore not considered in VOC calculations.

***PM10 content is from AP-42 Appendix B.1 Section 4.2.2.8 and Table B.2-3

Fabric Filter Control Efficiency = 95%. Therefore, controlled particulate emissions = 0.05 ton/yr

METHODOLOGY

Pounds of VOC per Gallon Coating less Water = (Density (lb/gal) * Weight % Organics) / (1-Volume % water)

Pounds of VOC per Gallon Coating = (Density (lb/gal) * Weight % Organics)

Potential VOC Pounds per Hour = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr)

Potential VOC Pounds per Day = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (24 hr/day)

Potential VOC Tons per Year = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (8760 hrs/yr) * (1 ton/2000 lbs)

Particulate Potential Tons per Year = (units/hour) * (gal/unit) * (lbs/gal) * (1- Weight % Volatiles) * (1-Transfer efficiency) * (8760 hrs/yr) * (1 ton/2000 lbs)

Pounds VOC per Gallon of Solids = (Density (lbs/gal) * Weight % organics) / (Volume % solids)

Total = Worst Coating + Sum of all solvents used

Material	Density (Lb/Gal)	Gallons of Material (gal/unit)	Maximum (unit/hour)	Weight % Toluene	Weight % MEK	Weight % Xylene	Toluene Emissions (ton/yr)	MEK Emissions (ton/yr)	Xylene Emissions (ton/yr)
Paint Booth									
<i>Water-Based Paints*</i>									
Black Satin W/B	9.16	0.27000	16.000	0.00%	0.00%	0.00%	0.00	0.00	0.00
Aluminum Coating - W/B	8.33	0.27000	16.000	0.00%	0.00%	0.00%	0.00	0.00	0.00
<i>Clean-up</i>									
Acetone**									
<i>Metal Prep</i>									
Hydroforce Cleaner	8.91	0.03400	16.000	0.00%	0.00%	0.00%	0.00	0.00	0.00
Total							0.00	0.00	0.00
<i>Aerosol for Touch-up Only</i>									
Statin Black (Aerosol)	6.19	0.07000	16.000	20.00%	10.00%	5.00%	6.07	3.04	1.52
Total							6.07	3.04	1.52

*Note that only one of the water-based paints can be used at a time. For this reason, only the paint with the worst-case emissions was used to determine the potential to emit from EU-08.

**Note that acetone is an exempt solvent and is therefore not considered in VOC calculations.

METHODOLOGY

HAPS emission rate (tons/yr) = Density (lb/gal) * Gal of Material (gal/unit) * Maximum (unit/hr) * Weight % HAP * 8760 hrs/yr * 1 ton/2000 lbs

Appendix A: Emissions Calculations

Degreasing

Company Name: American Art Clay Company, Inc.
Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
Permit Number: F097-26238-00514
Plt ID: 097-00514
Reviewer: M. Caraher
Date: 5/8/2008

Degreasing operations that do not exceed 145 gallons per 12 months, except if subject to 326 IAC 20-6:

VOC density (lbs/gal) =	7.36
Annual consumption (gal) =	145
Potential to Emit VOC =	0.53

Methodology

VOC density (lbs/gal) x annual consumption in gallons/ 2000 lbs/ton

Appendix A: Emissions Calculations

Natural Gas Combustion in EU-11 & IA-11

Company Name: American Art Clay Company, Inc.
 Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
 Permit Number: F097-26238-00514
 Plt ID: 097-00514
 Reviewer: M. Caraher
 Date: 5/8/2008

Heat Input (MMBtu/hr)
 Weil Boiler 1.15
 Fifteen Space Heaters 5.8
 6.95

Combined Heat Input Capacity MMBtu/hr: 6.95
 Potential Throughput MMCF/yr: 60.9

Emission Factor in lb/MMCF	Pollutant					
	PM*	PM10*	SO ₂	NO _x	VOC	CO
	1.9	7.6	0.6	100.0 **see below	5.5	84.0
Potential Emission in tons/yr	0.1	0.2	0.0	3.0	0.2	2.6

*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

Methodology

All emission factors are based on normal firing.
 MMBtu = 1,000,000 Btu
 MMCF = 1,000,000 Cubic Feet of Gas
 Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,000 MMBtu
 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 (SUPPLEMENT D 3/98)
 Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

Emission Factor in lb/MMCF	HAPs - Organics				
	Benzene	Dichloro-benzene	Formaldehyde	Hexane	Toluene
	2.1E-03	1.2E-03	7.5E-02	1.8E+00	3.4E-03
Potential Emission in tons/yr	6.393E-05	3.653E-05	2.283E-03	5.479E-02	1.035E-04

Emission Factor in lb/MMCF	HAPs - Metals					Combined HAP
	Lead	Cadmium	Chromium	Manganese	Nickel	
	5.0E-04	1.1E-03	1.4E-03	3.8E-04	2.1E-03	5.745E-02
Potential Emission in tons/yr	1.522E-05	3.349E-05	4.262E-05	1.157E-05	6.393E-05	

Methodology is the same as above.

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

Welding

Company Name: American Art Clay Company, Inc.
 Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
 Permit Number: F097-26238-00514
 Plt ID: 097-00514
 Reviewer: M. Caraher
 Date: 5/8/2008

PROCESS	Number of Stations	Max. electrode consumption per station (lbs/hr)	EMISSION FACTORS* (lb pollutant/lb electrode)				EMISSIONS (lbs/hr)				HAPS (lbs/hr)	
			PM = PM10	Mn	Ni	Cr	PM = PM10	Mn	Ni	Cr		
WELDING												
Submerged Arc	0	0		0.036	0.011			0.000	0.000	0.000	0	0.000
Metal Inert Gas (MIG)(carbon steel)	1	1.37		0.0055	0.0005			0.008	0.001	0.000	0	0.001
Stick (E7018 electrode)	0	0		0.0211	0.0009			0.000	0.000	0.000	0	0.000
Tungsten Inert Gas (TIG)(carbon steel)	0	0		0.0055	0.0005			0.000	0.000	0.000	0	0.000
Oxyacetylene(carbon steel)	0	0		0.0055	0.0005			0.000	0.000	0.000	0	0.000
FLAME CUTTING	Number of Stations	Max. Metal Thickness Cut (in.)	Max. Metal Cutting Rate (in./minute)	EMISSION FACTORS (lb pollutant/1,000 inches cut, 1" thick)**				EMISSIONS (lbs/hr)				HAPS (lbs/hr)
				PM = PM10	Mn	Ni	Cr	PM = PM10	Mn	Ni	Cr	
Oxyacetylene	0	0	0	0.1622	0.0005	0.0001	0.0003	0.000	0.000	0.000	0.000	0.000
Oxymethane	0			0.0815	0.0002		0.0002	0.000	0.000	0.000	0.000	0.000
Plasma**	0	0	0	0.0039				0.000	0.000	0.000	0.000	0.000
EMISSION TOTALS												
Potential Emissions lbs/hr								0.01				0.00
Potential Emissions lbs/day								0.18				0.02
Potential Emissions tons/year								0.03				0.00

METHODOLOGY

*Emission Factors are default values for carbon steel unless a specific electrode type is noted in the Process column.

**Emission Factor for plasma cutting from American Welding Society (AWS). Trials reported for wet cutting of 8 mm thick mild steel with 3.5 m/min cutting speed (at 0.2 g/min emitted). Therefore, the emission factor for plasma cutting is for 8 mm thick rather than 1 inch, and the maximum metal thickness is not used in calculating the emissions.

Using AWS average values: (0.25 g/min)/(3.6 m/min) x (0.0022 lb/g)/(39.37 in./m) x (1,000 in.) = 0.0039 lb/1,000 in. cut, 8 mm thick
 Plasma cutting emissions, lb/hr: (# of stations)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 8 mm thick)
 Cutting emissions, lb/hr: (# of stations)(max. metal thickness, in.)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 1" thick)
 Welding emissions, lb/hr: (# of stations)(max. lbs of electrode used/hr/station)(emission factor, lb. pollutant/lb. of electrode used)
 Emissions, lbs/day = emissions, lbs/hr x 24 hrs/day
 Emissions, tons/yr = emissions, lb/hr x 8,760 hrs/year x 1 ton/2,000 lbs.

Appendix A: Emissions Calculations

Solvent Mixing in IA-9

Company Name: American Art Clay Company, Inc.
Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
Permit Number: F097-26238-00514
Plt ID: 097-00514
Reviewer: M. Caraher
Date: 5/8/2008

Solvent	Density (lb/gal)	Weight % VOC	Flash Off %**	Actual Usage* hr/yr (gal/yr)	Potential Usage (gal/yr)	Potential VOC Emissions (ton/yr)	Xylene %	Potential Xylene Emissions (ton/yr)
Rub-N-Buff Solvent								
Solvent Blend S-0069	6.65	100.00%	2.70%	1976	17240.80	1.55	0.00%	0.00
V-18 Varnish	7.83	44.06%	2.70%	784	6840.48	0.32	10.00%	0.07
Brush-N-Leave Solvent								
Sc-100	6.66	100.00%	2.70%	468	4083.35	0.37	0.00%	0.00
Total						2.23		0.07

* Actual usage was based on 50% capacity and 2,008 hours per year. In order to determine the potential usage, the actual usage was brought up to 100% capacity and it was assumed it operated 8,760 hours per year.

** The flash off % was based on laboratory testing.

Methodology

Potential VOC Emissions (ton/yr) = Density (lb/gal) * Weight % VOC * Flash Off % * Potential Usage (gal/yr) / 2000 (lb/ton)

Potential Xylene Emissions (ton/yr) = Density (lb/gal) * Xylene % * Flash Off % * Potential Usage (gal/yr) / 2000 (lb/ton)

**Appendix A: Emissions Calculations
Printing in IA-10**

**Company Name: American Art Clay Company, Inc.
Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
Permit Number: F097-26238-00514
Pit ID: 097-00514
Reviewer: M. Caraher
Date: 5/8/2008**

Material	Density (Lb/Gal)	Weight % Volatile (H2O & Organics)	Weight % Water	Weight % Organics	Volume % Water	Volume % Non-Volatiles (solids)	Gal of Mat. (gal/unit)	Maximum (unit/hour)	Pounds VOC per gallon of coating less water	Pounds VOC per gallon of coating	Potential VOC pounds per hour	Potential VOC pounds per day	Potential VOC tons per year	Particulate Potential (ton/yr)	lb VOC/gal solids	Transfer Efficiency
Rubber Base Offset Inks	8.70	18.40%	0.00%	18.40%	0.00%	0.00%	0.00920	1.000	1.60	1.60	0.01	0.35	0.06	0.00	NA	100%
Offset Roller Cleaner & Blanket Wash	6.58	100.00%	0.00%	100.00%	0.00%	0.00%	0.02000	1.000	6.58	6.58	0.13	3.16	0.58	0.00	NA	100%
DN-H5 Hand Developer	8.41	95.00%	88.00%	7.00%	70.22%	0.00%	0.02000	1.000	1.98	0.59	0.01	0.28	0.05	0.00	NA	100%
Misc - All others	8.33	100.00%	0.00%	100.00%	0.00%	0.00%	0.02000	1.000	8.33	8.33	0.17	4.00	0.73	0.00	NA	100%

Total

1.42

Note: These coatings do not contain any HAPs.

METHODOLOGY

Pounds of VOC per Gallon Coating less Water = (Density (lb/gal) * Weight % Organics) / (1-Volume % water)

Pounds of VOC per Gallon Coating = (Density (lb/gal) * Weight % Organics)

Potential VOC Pounds per Hour = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr)

Potential VOC Pounds per Day = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (24 hr/day)

Potential VOC Tons per Year = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (8760 hr/yr) * (1 ton/2000 lbs)

Particulate Potential Tons per Year = (units/hour) * (gal/unit) * (lbs/gal) * (1- Weight % Volatiles) * (1-Transfer efficiency) *(8760 hrs/yr) *(1 ton/2000 lbs)

Pounds VOC per Gallon of Solids = (Density (lbs/gal) * Weight % organics) / (Volume % solids)

Total = Worst Coating + Sum of all solvents used

Appendix A: Emissions Calculations

Unrestricted & Limited Potential to Emit

Company Name: American Art Clay Company, Inc.
 Address City IN Zip: 6060 N. Guion Road, Indianapolis, Indiana 46254
 Permit Number: F097-26238-00514
 Pit ID: 097-00514
 Reviewer: M. Caraher
 Date: 5/8/2008

	Unrestricted Potential to Emit (tons per year)						Single	Combination	Limited Potential to Emit (tons per year)						Single	Combination
	PM	PM10	NO _x	SO ₂	VOC	CO	HAP	HAP	PM	PM10	NO _x	SO ₂	VOC	CO	HAP	HAP
EU-01a	1.58	1.34	0.00	0.00	0.00	0.00	2.86E-02	2.86E-02	1.58	1.34	0.00	0.00	0.00	0.00	2.86E-02	2.86E-02
EU-01b	3.94	3.35	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	3.94	3.35	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-03a,b,c & EU-04 & EU-04d	51.36	43.65	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	51.36	8.50	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-05 & 1A-2	2.45	1.18	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	2.45	1.18	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-06	27.03	11.84	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	27.03	8.50	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-3a	0.53	0.45	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	0.53	0.45	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-3b	0.53	0.45	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	0.53	0.45	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-12(6)	30.95	21.59	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	30.95	21.59	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-12	15.48	13.15	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	15.48	13.15	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-13(6)	15.48	13.15	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	15.48	13.15	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-4	0.39	0.09	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	0.39	0.09	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-5	0.32	0.28	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	0.32	0.28	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-3a & b *	1.05	0.89	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	1.05	0.89	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
IA-7	0.17	0.07	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00	0.17	0.07	0.00	0.00	0.00	0.00	0.00E+00	0.00E+00
EU-07	7.76	1.56	0.00	0.00	35.24	0.00	4.76E+00	5.74E+00	7.76	1.56	0.00	0.00	35.24	0.00	4.76E+00	5.74E+00
EU-08	36.97	7.44	0.00	0.00	16.71	0.00	0.00E+00	0.00E+00	36.97	7.44	0.00	0.00	16.71	0.00	0.00E+00	0.00E+00
EU-08a	0.96	0.19	0.00	0.00	17.31	0.00	6.07E+00	1.06E+01	0.96	0.19	0.00	0.00	17.31	0.00	6.07E+00	1.06E+01
degreasing	0.00	0.00	0.00	0.00	0.53	0.00	0.00E+00	0.00E+00	0.00	0.00	0.00	0.00	0.53	0.00	0.00E+00	0.00E+00
EU-11 & IA-11	0.06	0.23	3.04	0.02	0.17	2.56	5.48E-02	5.74E-02	0.06	0.23	3.04	0.02	0.17	2.56	5.48E-02	5.74E-02
welding	0.03	0.03	0.00	0.00	0.00	0.00	3.00E-03	3.00E-03	0.03	0.03	0.00	0.00	0.00	0.00	3.00E-03	3.00E-03
solvent mixing	0.00	0.00	0.00	0.00	2.23	0.00	7.23E-02	7.23E-02	0.00	0.00	0.00	0.00	2.23	0.00	7.23E-02	7.23E-02
printing	0.00	0.00	0.00	0.00	1.42	0.00	0.00E+00	0.00E+00	0.00	0.00	0.00	0.00	1.42	0.00	0.00E+00	0.00E+00
Total Emissions	195.98	120.06	3.04	0.02	73.62	2.56	6.35E+00	1.65E+01	195.98	81.56	3.04	0.02	73.62	2.56	6.35E+00	1.65E+01

* Total Emissions are minus the Floral Clay Mixing emissions in IA-3a & b. See footnote on page 1.