



Mitchell E. Daniels, Jr.  
Governor

Thomas W. Easterly  
Commissioner

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

TO: Interested Parties / Applicant  
DATE: February 4, 2011  
RE: Inwood Office Furniture Co., Inc / 037-29306-00012  
FROM: Matthew Stuckey, Deputy Branch Chief  
Permits Branch  
Office of Air Quality

### Notice of Decision: Approval – Effective Immediately

Please be advised that on behalf of the Commissioner of the Department of Environmental Management, I have issued a decision regarding the enclosed matter. Pursuant to IC 13-15-5-3, this permit is effective immediately, unless a petition for stay of effectiveness is filed and granted, 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 4-21.5-3-7 and IC 13-15-6-1(b) or IC 13-15-6-1(a) require that you file a petition for administrative review. This petition may include a request for stay of effectiveness and must be submitted to the Office of Environmental Adjudication, 100 North Senate Avenue, Government Center North, Suite N 501E, Indianapolis, IN 46204.

For an **initial Title V Operating Permit**, a petition for administrative review must be submitted to the Office of Environmental Adjudication within **thirty (30)** days from the receipt of this notice provided under IC 13-15-5-3, pursuant to IC 13-15-6-1(b).

For a **Title V Operating Permit renewal**, a petition for administrative review must be submitted to the Office of Environmental Adjudication within **fifteen (15)** days from the receipt of this notice provided under IC 13-15-5-3, pursuant to IC 13-15-6-1(a).

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.

Pursuant to 326 IAC 2-7-18(d), any person may petition the U.S. EPA to object to the issuance of an initial Title V operating permit, permit renewal, or modification within sixty (60) days of the end of the forty-five (45) day EPA review period. Such an objection must be based only on issues that were raised with reasonable specificity during the public comment period, unless the petitioner demonstrates that it was impracticable to raise such issues, or if the grounds for such objection arose after the comment period.

To petition the U.S. EPA to object to the issuance of a Title V operating permit, contact:

U.S. Environmental Protection Agency  
401 M Street  
Washington, D.C. 20406

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



**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT**

*We Protect Hoosiers and Our Environment.*

*Mitchell E. Daniels Jr.*  
Governor

*Thomas W. Easterly*  
Commissioner

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

**Part 70 Operating Permit Renewal  
OFFICE OF AIR QUALITY**

**Inwood Office Furniture Co., Inc.  
1108 East 15th Street  
Jasper, Indiana 47546**

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

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

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

Operation Permit No.: T037-29306-00012	
Issued by:  Chrystal A. Wagner, Section Chief Permits Branch Office of Air Quality	Issuance Date: February 4, 2011  Expiration Date: February 4, 2016

## TABLE OF CONTENTS

<b>A. SOURCE SUMMARY</b> .....	<b>5</b>
A.1 General Information [326 IAC 2-7-4(c)][326 IAC 2-7-5(15)][326 IAC 2-7-1(22)]	
A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-7-4(c)(3)] [326 IAC 2-7-5(15)]	
A.3 Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]	
A.4 Part 70 Permit Applicability [326 IAC 2-7-2]	
<b>B. GENERAL CONDITIONS</b> .....	<b>8</b>
B.1 Definitions [326 IAC 2-7-1]	
B.2 Permit Term [326 IAC 2-7-5(2)][326 IAC 2-1.1-9.5][326 IAC 2-7-4(a)(1)(D)] [IC 13-15-3-6(a)]	
B.3 Term of Conditions [326 IAC 2-1.1-9.5]	
B.4 Enforceability [326 IAC 2-7-7] [IC 13-17-12]	
B.5 Severability [326 IAC 2-7-5(5)]	
B.6 Property Rights or Exclusive Privilege [326 IAC 2-7-5(6)(D)]	
B.7 Duty to Provide Information [326 IAC 2-7-5(6)(E)]	
B.8 Certification [326 IAC 2-7-4(f)][326 IAC 2-7-6(1)][326 IAC 2-7-5(3)(C)]	
B.9 Annual Compliance Certification [326 IAC 2-7-6(5)]	
B.10 Preventive Maintenance Plan [326 IAC 2-7-5(1),(3) and (13)][326 IAC 2-7-6(1) and (6)] [326 IAC 1-6-3]	
B.11 Emergency Provisions [326 IAC 2-7-16]	
B.12 Permit Shield [326 IAC 2-7-15][326 IAC 2-7-20][326 IAC 2-7-12]	
B.13 Prior Permits Superseded [326 IAC 2-1.1-9.5][326 IAC 2-7-10.5]	
B.14 Termination of Right to Operate [326 IAC 2-7-10][326 IAC 2-7-4(a)]	
B.15 Permit Modification, Reopening, Revocation and Reissuance, or Termination [326 IAC 2-7-5(6)(C)][326 IAC 2-7-8(a)][326 IAC 2-7-9]	
B.16 Permit Renewal [326 IAC 2-7-3][326 IAC 2-7-4][326 IAC 2-7-8(e)]	
B.17 Permit Amendment or Modification [326 IAC 2-7-11][326 IAC 2-7-12]	
B.18 Permit Revision Under Economic Incentives and Other Programs [326 IAC 2-7-5(8)] [326 IAC 2-7-12(b)(2)]	
B.19 Operational Flexibility [326 IAC 2-7-20][326 IAC 2-7-10.5]	
B.20 Source Modification Requirement [326 IAC 2-7-10.5]	
B.21 Inspection and Entry [326 IAC 2-7-6][IC 13-14-2-2][IC 13-30-3-1][IC 13-17-3-2]	
B.22 Transfer of Ownership or Operational Control [326 IAC 2-7-11]	
B.23 Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-7-5(7)][326 IAC 2-1.1-7]	
B.24 Credible Evidence [326 IAC 2-7-5(3)][326 IAC 2-7-6][62 FR 8314] [326 IAC 1-1-6]	
<b>C. SOURCE OPERATION CONDITIONS</b> .....	<b>18</b>
<b>Emission Limitations and Standards [326 IAC 2-7-5(1)]</b>	
C.1 Opacity [326 IAC 5-1]	
C.2 Open Burning [326 IAC 4-1] [IC 13-17-9]	
C.3 Incineration [326 IAC 4-2] [326 IAC 9-1-2]	
C.4 Fugitive Dust Emissions [326 IAC 6-4]	
C.5 Fugitive Particulate Matter Emission Limitations [326 IAC 6-5]	
C.6 Stack Height [326 IAC 1-7]	
C.7 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61, Subpart M]	
<b>Testing Requirements [326 IAC 2-7-6(1)]</b>	
C.8 Performance Testing [326 IAC 3-6]	
<b>Compliance Requirements [326 IAC 2-1.1-11]</b>	
C.9 Compliance Requirements [326 IAC 2-1.1-11]	

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

- C.10 Compliance Monitoring [326 IAC 2-7-5(3)][326 IAC 2-7-6(1)]
- C.11 Instrument Specifications [326 IAC 2-1.1-11] [326 IAC 2-7-5(3)]  
[326 IAC 2-7-6(1)]

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

- C.12 Emergency Reduction Plans [326 IAC 1-5-2] [326 IAC 1-5-3]
- C.13 Risk Management Plan [326 IAC 2-7-5(12)] [40 CFR 68]
- C.14 Response to Excursions or Exceedances [326 IAC 2-7-5] [326 IAC 2-7-6]
- C.15 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5]  
[326 IAC 2-7-6]

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

- C.16 Emission Statement [326 IAC 2-7-5(3)(C)(iii)][326 IAC 2-7-5(7)][326 IAC 2-7-19(c)]  
[326 IAC 2-6]
- C.17 General Record Keeping Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-6]
- C.18 General Reporting Requirements [326 IAC 2-7-5(3)(C)] [326 IAC 2-1.1-11]

**Stratospheric Ozone Protection**

- C.19 Compliance with 40 CFR 82 and 326 IAC 22-1

**D.1. EMISSIONS UNIT OPERATION CONDITIONS .....24**

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

- D.1.1 PSD Minor Limit [326 IAC 2-2]
- D.1.2 Volatile Organic Compounds (VOC) [326 IAC 8-2-12]
- D.1.3 Particulate Matter (PM) [326 IAC 6.5-1-2]
- D.1.4 Preventive Maintenance Plan [326 IAC 2-7-5(13)]

**Compliance Determination Requirements**

- D.1.5 Volatile Organic Compounds (VOC) [326 IAC 8-1-4] [326 IAC 8-1-2(a)]
- D.1.6 Particulate Control

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

- D.1.7 Monitoring

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

- D.1.8 Record Keeping Requirements
- D.1.9 Reporting Requirements

**D.2. EMISSIONS UNIT OPERATION CONDITIONS .....28**

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

- D.2.1 Particulate Matter (PM) [326 IAC 6.5-1-2]
- D.2.2 Preventive Maintenance Plan [326 IAC 2-7-5(13)]

**Compliance Determination Requirements**

- D.2.3 Particulate Control

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

- D.2.4 Visible Emissions Notations
- D.2.5 Parametric Monitoring
- D.2.6 Broken or Failed Bag Detection

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

- D.2.7 Record Keeping Requirements

**D.3. EMISSIONS UNIT OPERATION CONDITIONS .....30**

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

- D.3.1 Baghouse Limitations [326 IAC 2-7-1(21)(G)(xxix)]
- D.3.2 Particulate Matter (PM) [326 IAC 6.5-1-2]
- D.3.3 Preventive Maintenance Plan [326 IAC 2-7-5(13)]

**Compliance Determination Requirements**

- D.3.4 Particulate Control [326 IAC 2-7-1(21)(G)(xxix)(DD)]

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

- D.3.5 Visible Emissions Notations
- D.3.6 Baghouse Inspections [326 IAC 2-7-1(21)(G)(xxix)(FF)]
- D.3.7 Broken or Failed Bag Detection

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

- D.3.8 Record Keeping Requirements

**D.4. EMISSIONS UNIT OPERATION CONDITIONS .....33**

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

- D.4.1 Particulate [326 IAC 6.5-1-2]

**E.1. EMISSIONS UNIT OPERATION CONDITIONS .....34**

**National Emission Standards for Hazardous Air Pollutants (NESHAP) Requirements [326 IAC 2-7-5(1)]**

- E.1.1 General Provisions Relating to National Emission Standards for Hazardous Air Pollutants under 40 CFR Part 63 [326 IAC 20-1][40 CFR Part 63, Subpart A]
- E.1.2 National Emission Standards for Hazardous Air Pollutants (NESHAP) [40 CFR 63, Subpart JJ]

Certification.....37  
Emergency Occurrence Report.....38  
Part 70 Usage Report.....40  
Quarterly Deviation and Compliance Monitoring Report.....42

Attachment A: NESHAP Subpart JJ--National Emission Standards for Wood Furniture Manufacturing

## SECTION A SOURCE SUMMARY

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 through A.3 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this permit pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

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

---

The Permittee owns and operates a stationary wood furniture manufacturing operation.

Source Address:	1108 East 15th Street, Jasper, Indiana 47546
General Source Phone Number:	(812) 482-6121
SIC Code:	2521
County Location:	Dubois
Source Location Status:	Nonattainment for PM <sub>2.5</sub> standard Attainment for all other criteria pollutants
Source Status:	Part 70 Operating Permit Program Minor Source, under PSD and Nonattainment NSR Major 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 2-7-4(c)(3)][326 IAC 2-7-5(15)]

---

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

- (a) Surface coating line 1 operations (booths EU 01 through EU 12) consisting of the following:
- (1) One (1) contact glue booth (EU 01) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack A. This booth was installed prior to 1974.
  - (2) Three (3) stain booths (EU 02, EU 03 and EU 04) with a maximum throughput rate of 3 units per hour each, controlled by dry filters and exhausting at stacks B, C and D. These booths were installed prior to 1974.
  - (3) One (1) wipe stain booth (EU 05) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack E. This booth was installed prior to 1974.
  - (4) One (1) sealer booth (EU 06) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack F. This booth was installed prior to 1974.
  - (5) One (1) lacquer booth (EU 07) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack G. This booth was installed prior to 1974.
  - (6) One (1) lacquer booth (EU 08) with a maximum throughput rate of 8 units per hour, controlled by dry filters and exhausting at stack H. This booth was installed prior to 1974.
  - (7) One (1) wipe stain booth (EU 09) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack I. This booth was installed prior to 1974.

- (8) One (1) lacquer booth (EU 10) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack J. This booth was installed prior to 1974.
- (9) One (1) black enamel booth (EU 11) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack K. This booth was installed in 1998.
- (10) One (1) stain booth (EU 12) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack L. This booth was installed prior to 1974.

Under 40 CFR 63, Subpart JJ, the surface coating line 1, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (a) refers to desks and desktops.

(b) Surface coating line 2 operation consisting of the following:

- (1) One (1) SAP/NGR Booth (identified as EU 21/EU 22) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stacks 2A and 2B. This booth was installed in 2000.
- (2) One (1) Wash Coat Booth (identified as EU 23) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2C. This booth was installed in 2000.
- (3) One (1) Stain Booth (identified as EU 25) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (4) One (1) Sealer Booth (identified as EU 27) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (5) One (1) First Topcoat Booth with one (1) flash tunnel (identified as EU 29) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2H. The flash tunnel exhausts at stack 21. This booth was installed in 2000.
- (6) One (1) Second Topcoat Booth with one (1) flash tunnel (identified as EU 30) with a maximum rated capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2J. The flash tunnel exhausts at stack 2K. This booth and flash tunnel were installed in 2000.

Under 40 CFR 63, Subpart JJ, the surface coating line 2, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (b) refers to desks and desktops and desktops.

(c) One (1) Final Touch-up Sanding Booth (identified as 32) with a maximum throughput capacity of 7.50 tons of wood per hour and controlled by cartridge-filters.

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

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

- (a) Woodworking operations (identified as EU 14) with a maximum throughput rate of 2,750 pounds of wood per hour, controlled by a baghouse and exhausting at stack N. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6.5-1-2]
- (b) One (1) natural gas-fired boiler (identified as EU 13) with a maximum heat input capacity of 2.60 MMBtu per hour and exhausting at stack M. [326 IAC 6.5-1-2]
- (c) One (1) natural gas-fired air makeup unit utilized for general building ventilation (identified as EU 33) with a maximum heat input capacity of 2.10 MMBtu per hour, and exhausting externally. [326 IAC 6.5-1-2]
- (d) Seven (7) natural gas-fired air makeup units, two (2) integrated with the SAP/NGR Booth and one (1) integrated with each of the other five (5) surface coating booths located on the second surface coating line operations, each with a maximum heat input capacity of 1.50 MMBtu per hour and exhausting internally into the booth. [326 IAC 6.5-1-2]
- (e) Two (2) natural gas-fired drying ovens (identified as EU 26 and EU 31) used in conjunction with the second surface coating line operations and each with a maximum heat input capacity of 1.00 MMBtu per hour. The ovens 26 and 31 exhaust at stacks 2E and 2L, respectively and were installed in 2000. [326 IAC 6.5-1-2(a)]
- (f) One (1) natural gas-fired drying oven (identified as EU 28) used in conjunction with the second surface coating line operations and with a maximum heat input capacity of 4.0 MMBtu per hour. This oven exhausts at stacks 2G-1, 2G-2, and 2G-3, and was installed in 2000. [326 IAC 6.5-1-2(a)]
- (g) One (1) repair sanding booth (identified as EU 15), with a maximum capacity of ten (10) units per hour, installed in 1995, controlled by a baghouse and exhausting within the building. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6.5-1-2(a)]
- (h) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]

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

---

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

- (a) It is a major source, as defined in 326 IAC 2-7-1(22);
- (b) It is a source in a source category designated by the United States Environmental Protection Agency (U.S. EPA) under 40 CFR 70.3 (Part 70 - Applicability).

## SECTION B GENERAL CONDITIONS

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

---

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

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

---

- (a) This permit, T037-29306-00012, is issued for a fixed term of five (5) years from the issuance date of this permit, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3. Subsequent revisions, modifications, or amendments of this permit do not affect the expiration date of this permit.
- (b) If IDEM, OAQ, upon receiving a timely and complete renewal permit application, fails to issue or deny the permit renewal prior to the expiration date of this permit, this existing permit shall not expire and all terms and conditions shall continue in effect, including any permit shield provided in 326 IAC 2-7-15, until the renewal permit has been issued or denied.

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

---

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

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

### B.4 Enforceability [326 IAC 2-7-7] [IC 13-17-12]

---

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

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

---

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

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

---

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

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

---

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

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

---

- (a) A certification required by this permit meets the requirements of 326 IAC 2-7-6(1) if:
- (1) it contains a certification by a "responsible official" as defined by 326 IAC 2-7-1(34), and

- (2) the certification states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.
- (b) The Permittee may use the attached Certification Form, or its equivalent with each submittal requiring certification. One (1) certification may cover multiple forms in one (1) submittal.
- (c) A "responsible official" is defined at 326 IAC 2-7-1(34).

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

---

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

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

and

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

- (b) The annual compliance certification report required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) The annual compliance certification report shall include the following:
  - (1) The appropriate identification of each term or condition of this permit that is the basis of the certification;
  - (2) The compliance status;
  - (3) Whether compliance was continuous or intermittent;
  - (4) The methods used for determining the compliance status of the source, currently and over the reporting period consistent with 326 IAC 2-7-5(3); and
  - (5) Such other facts, as specified in Sections D of this permit, as IDEM, OAQ may require to determine the compliance status of the source.

The submittal by the Permittee does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

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

---

- (a) A Preventive Maintenance Plan meets the requirements of 326 IAC 1-6-3 if it includes, at a minimum:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

The Permittee shall implement the PMPs.

- (b) If required by specific condition(s) in Section D of this permit where no PMP was previously required, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMPs) no later than ninety (90) days after issuance of this permit or ninety (90) days after initial start-up, whichever is later, including the following information on each facility:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

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

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

The PMP extension notification does not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

The Permittee shall implement the PMPs.

- (c) A copy of the PMPs shall be submitted to IDEM, OAQ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions. The PMPs and their submittal do not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).
- (d) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

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

---

- (a) An emergency, as defined in 326 IAC 2-7-1(12), is not an affirmative defense for an action brought for noncompliance with a federal or state health-based emission limitation.
- (b) An emergency, as defined in 326 IAC 2-7-1(12), constitutes an affirmative defense to an action brought for noncompliance with a technology-based emission limitation if the affirmative

defense of an emergency is demonstrated through properly signed, contemporaneous operating logs or other relevant evidence that describe the following:

- (1) An emergency occurred and the Permittee can, to the extent possible, identify the causes of the emergency;
- (2) The permitted facility was at the time being properly operated;
- (3) During the period of an emergency, the Permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards or other requirements in this permit;
- (4) For each emergency lasting one (1) hour or more, the Permittee notified IDEM, OAQ, or Southwest Regional Office within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

Telephone Number: 1-800-451-6027 (ask for Office of Air Quality, Compliance and Enforcement Branch), or  
Telephone Number: 317-233-0178 (ask for Office of Air Quality, Compliance and Enforcement Branch)  
Facsimile Number: 317-233-6865  
Southwest Regional Office phone: (812) 380-2305; fax: (812) 380-2304.

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

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

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

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

- (A) A description of the emergency;
- (B) Any steps taken to mitigate the emissions; and
- (C) Corrective actions taken.

The notification which shall be submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

- (6) The Permittee immediately took all reasonable steps to correct the emergency.
- (c) In any enforcement proceeding, the Permittee seeking to establish the occurrence of an emergency has the burden of proof.
  - (d) This emergency provision supersedes 326 IAC 1-6 (Malfunctions). This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.

- (e) The Permittee seeking to establish the occurrence of an emergency shall make records available upon request to ensure that failure to implement a PMP did not cause or contribute to an exceedance of any limitations on emissions. However, IDEM, OAQ may require that the Preventive Maintenance Plans required under 326 IAC 2-7-4(c)(9) be revised in response to an emergency.
- (f) Failure to notify IDEM, OAQ by telephone or facsimile of an emergency lasting more than one (1) hour in accordance with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-7 and any other applicable rules.
- (g) If the emergency situation causes a deviation from a technology-based limit, the Permittee may continue to operate the affected emitting facilities during the emergency provided the Permittee immediately takes all reasonable steps to correct the emergency and minimize emissions.

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

- (a) Pursuant to 326 IAC 2-7-15, the Permittee has been granted a permit shield. The permit shield provides that compliance with the conditions of this permit shall be deemed compliance with any applicable requirements as of the date of permit issuance, provided that either the applicable requirements are included and specifically identified in this permit or the permit contains an explicit determination or concise summary of a determination that other specifically identified requirements are not applicable. The Indiana statutes from IC 13 and rules from 326 IAC, referenced in conditions in this permit, are those applicable at the time the permit was issued. The issuance or possession of this permit shall not alone constitute a defense against an alleged violation of any law, regulation or standard, except for the requirement to obtain a Part 70 permit under 326 IAC 2-7 or for applicable requirements for which a permit shield has been granted.

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

- (b) If, after issuance of this permit, it is determined that the permit is in nonconformance with an applicable requirement that applied to the source on the date of permit issuance, IDEM, OAQ, shall immediately take steps to reopen and revise this permit and issue a compliance order to the Permittee to ensure expeditious compliance with the applicable requirement until the permit is reissued. The permit shield shall continue in effect so long as the Permittee is in compliance with the compliance order.
- (c) No permit shield shall apply to any permit term or condition that is determined after issuance of this permit to have been based on erroneous information supplied in the permit application. Erroneous information means information that the Permittee knew to be false, or in the exercise of reasonable care should have been known to be false, at the time the information was submitted.
- (d) Nothing in 326 IAC 2-7-15 or in this permit shall alter or affect the following:
  - (1) The provisions of Section 303 of the Clean Air Act (emergency orders), including the authority of the U.S. EPA under Section 303 of the Clean Air Act;
  - (2) The liability of the Permittee for any violation of applicable requirements prior to or at the time of this permit's issuance;
  - (3) The applicable requirements of the acid rain program, consistent with Section 408(a) of the Clean Air Act; and
  - (4) The ability of U.S. EPA to obtain information from the Permittee under Section 114 of the Clean Air Act.

- (e) This permit shield is not applicable to any change made under 326 IAC 2-7-20(b)(2) (Sections 502(b)(10) of the Clean Air Act changes) and 326 IAC 2-7-20(c)(2) (trading based on State Implementation Plan (SIP) provisions).
- (f) This permit shield is not applicable to modifications eligible for group processing until after IDEM, OAQ, has issued the modifications. [326 IAC 2-7-12(c)(7)]
- (g) This permit shield is not applicable to minor Part 70 permit modifications until after IDEM, OAQ, has issued the modification. [326 IAC 2-7-12(b)(8)]

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

- (a) All terms and conditions of permits established prior to T037-29306-00012 and issued pursuant to permitting programs approved into the state implementation plan have been either:
  - (1) incorporated as originally stated,
  - (2) revised under 326 IAC 2-7-10.5, or
  - (3) deleted under 326 IAC 2-7-10.5.
- (b) Provided that all terms and conditions are accurately reflected in this permit, all previous registrations and permits are superseded by this Part 70 operating permit.

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

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

B.15 Permit Modification, Reopening, Revocation and Reissuance, or Termination [326 IAC 2-7-5(6)(C)][326 IAC 2-7-8(a)][326 IAC 2-7-9]

- (a) This permit may be modified, reopened, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a Part 70 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 2-7-5(6)(C)] The notification by the Permittee does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).
- (b) This permit shall be reopened and revised under any of the circumstances listed in IC 13-15-7-2 or if IDEM, OAQ determines any of the following:
  - (1) That this permit contains a material mistake.
  - (2) That inaccurate statements were made in establishing the emissions standards or other terms or conditions.
  - (3) That this permit must be revised or revoked to assure compliance with an applicable requirement. [326 IAC 2-7-9(a)(3)]
- (c) Proceedings by IDEM, OAQ to reopen and revise this permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. Such reopening and revision shall be made as expeditiously as practicable. [326 IAC 2-7-9(b)]
- (d) The reopening and revision of this permit, under 326 IAC 2-7-9(a), shall not be initiated before notice of such intent is provided to the Permittee by IDEM, OAQ at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ may provide a shorter time period in the case of an emergency. [326 IAC 2-7-9(c)]

B.16 Permit Renewal [326 IAC 2-7-3][326 IAC 2-7-4][326 IAC 2-7-8(e)]

- (a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAQ and shall include the information specified in 326 IAC 2-7-4. Such information shall be included in the application for each emission unit at this source, except those emission units included on the trivial or insignificant activities list contained in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(40). The renewal application does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

Request for renewal shall be submitted to:

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

- (b) A timely renewal application is one that is:
- (1) Submitted at least nine (9) months prior to the date of the expiration of this permit; and
  - (2) If the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) If the Permittee submits a timely and complete application for renewal of this permit, the source's failure to have a permit is not a violation of 326 IAC 2-7 until IDEM, OAQ takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified, pursuant to 326 IAC 2-7-4(a)(2)(D), in writing by IDEM, OAQ any additional information identified as being needed to process the application.

B.17 Permit Amendment or Modification [326 IAC 2-7-11][326 IAC 2-7-12]

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

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

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

Any such application does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

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

B.18 Permit Revision Under Economic Incentives and Other Programs  
[326 IAC 2-7-5(8)][326 IAC 2-7-12(b)(2)]

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

- (b) Notwithstanding 326 IAC 2-7-12(b)(1) and 326 IAC 2-7-12(c)(1), minor Part 70 permit modification procedures may be used for Part 70 modifications involving the use of economic

incentives, marketable Part 70 permits, emissions trading, and other similar approaches to the extent that such minor Part 70 permit modification procedures are explicitly provided for in the applicable State Implementation Plan (SIP) or in applicable requirements promulgated or approved by the U.S. EPA.

B.19 Operational Flexibility [326 IAC 2-7-20][326 IAC 2-7-10.5]

---

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

- (1) The changes are not modifications under any provision of Title I of the Clean Air Act;
- (2) Any preconstruction approval required by 326 IAC 2-7-10.5 has been obtained;
- (3) The changes do not result in emissions which exceed the limitations provided in this permit (whether expressed herein as a rate of emissions or in terms of total emissions);
- (4) The Permittee notifies the:

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

and

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

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

- (5) The Permittee maintains records on-site, on a rolling five (5) year basis, which document all such changes and emission trades that are subject to 326 IAC 2-7-20(b),(c), or (e). The Permittee shall make such records available, upon reasonable request, for public review.

Such records shall consist of all information required to be submitted to IDEM, OAQ in the notices specified in 326 IAC 2-7-20(b)(1), (c)(1), and (e)(2).

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

- (1) A brief description of the change within the source;
- (2) The date on which the change will occur;
- (3) Any change in emissions; and
- (4) Any permit term or condition that is no longer applicable as a result of the change.

The notification which shall be submitted is not considered an application form, report or compliance certification. Therefore, the notification by the Permittee does not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

- (c) Emission Trades [326 IAC 2-7-20(c)]  
The Permittee may trade emissions increases and decreases at the source, where the applicable SIP provides for such emission trades without requiring a permit revision, subject to the constraints of Section (a) of this condition and those in 326 IAC 2-7-20(c).
- (d) Alternative Operating Scenarios [326 IAC 2-7-20(d)]  
The Permittee may make changes at the source within the range of alternative operating scenarios that are described in the terms and conditions of this permit in accordance with 326 IAC 2-7-5(9). No prior notification of IDEM, OAQ, or U.S. EPA is required.
- (e) Backup fuel switches specifically addressed in, and limited under, Section D of this permit shall not be considered alternative operating scenarios. Therefore, the notification requirements of part (a) of this condition do not apply.

B.20 Source Modification Requirement [326 IAC 2-7-10.5]

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

B.21 Inspection and Entry [326 IAC 2-7-6][IC 13-14-2-2][IC 13-30-3-1][IC 13-17-3-2]

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

- (a) Enter upon the Permittee's premises where a Part 70 source is located, or emissions related activity is conducted, or where records must be kept under the conditions of this permit;
- (b) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, have access to and copy any records that must be kept under the conditions of this permit;
- (c) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, inspect any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit;
- (d) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, sample or monitor substances or parameters for the purpose of assuring compliance with this permit or applicable requirements; and
- (e) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, utilize any photographic, recording, testing, monitoring, or other equipment for the purpose of assuring compliance with this permit or applicable requirements.

B.22 Transfer of Ownership or Operational Control [326 IAC 2-7-11]

- (a) The Permittee must comply with the requirements of 326 IAC 2-7-11 whenever the Permittee seeks to change the ownership or operational control of the source and no other change in the permit is necessary.
- (b) Any application requesting a change in the ownership or operational control of the source shall contain a written agreement containing a specific date for transfer of permit responsibility, coverage and liability between the current and new Permittee. The application shall be submitted to:

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

Any such application does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

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

B.23 Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-7-5(7)][326 IAC 2-1.1-7]

- (a) The Permittee shall pay annual fees to IDEM, OAQ within thirty (30) calendar days of receipt of a billing. Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ the applicable fee is due April 1 of each year.
- (b) Except as provided in 326 IAC 2-7-19(e), failure to pay may result in administrative enforcement action or revocation of this permit.
- (c) The Permittee may call the following telephone numbers: 1-800-451-6027 or 317-233-4230 (ask for OAQ, Billing, Licensing, and Training Section), to determine the appropriate permit fee.

B.24 Credible Evidence [326 IAC 2-7-5(3)][326 IAC 2-7-6][62 FR 8314] [326 IAC 1-1-6]

For the purpose of submitting compliance certifications or establishing whether or not the Permittee has violated or is in violation of any 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 2-7-5(1)]

#### C.1 Opacity [326 IAC 5-1]

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

- (a) Opacity shall not exceed an average of 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.2 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.3 Incineration [326 IAC 4-2] [326 IAC 9-1-2]

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

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

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

#### C.5 Fugitive Particulate Matter Emission Limitations [326 IAC 6-5]

Pursuant to 326 IAC 6-5 (Fugitive Particulate Matter Emission Limitations), fugitive particulate matter emissions shall be controlled according to the attached plan as in Attachment A. The provisions of 326 IAC 6-5 are not federally enforceable.

#### C.6 Stack Height [326 IAC 1-7]

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

#### C.7 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61, Subpart M]

- (a) Notification requirements apply to each owner or operator. If the combined amount of regulated asbestos containing material (RACM) to be stripped, removed or disturbed is at least 260 linear feet on pipes or 160 square feet on other facility components, or at least thirty-five (35) cubic feet on all facility components, then the notification requirements of 326 IAC 14-10-3 are mandatory. All demolition projects require notification whether or not asbestos is present.
- (b) The Permittee shall ensure that a written notification is sent on a form provided by the Commissioner at least ten (10) working days before asbestos stripping or removal work or

before demolition begins, per 326 IAC 14-10-3, and shall update such notice as necessary, including, but not limited to the following:

- (1) When the amount of affected asbestos containing material increases or decreases by at least twenty percent (20%); or
- (2) If there is a change in the following:
  - (A) Asbestos removal or demolition start date;
  - (B) Removal or demolition contractor; or
  - (C) Waste disposal site.
- (c) The Permittee shall ensure that the notice is postmarked or delivered according to the guidelines set forth in 326 IAC 14-10-3(2).
- (d) The notice to be submitted shall include the information enumerated in 326 IAC 14-10-3(3).

All required notifications shall be submitted to:

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

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

- (e) **Procedures for Asbestos Emission Control**  
The Permittee shall comply with the applicable emission control procedures in 326 IAC 14-10-4 and 40 CFR 61.145(c). Per 326 IAC 14-10-1, emission control requirements are applicable for any removal or disturbance of RACM greater than three (3) linear feet on pipes or three (3) square feet on any other facility components or a total of at least 0.75 cubic feet on all facility components.
- (f) **Demolition and Renovation**  
The Permittee shall thoroughly inspect the affected facility or part of the facility where the demolition or renovation will occur for the presence of asbestos pursuant to 40 CFR 61.145(a).
- (g) **Indiana 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. The requirement to use an Indiana Licensed Asbestos inspector is not federally enforceable.

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

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

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

Indiana Department of Environmental Management  
Compliance and Enforcement Branch, Office of Air Quality

100 North Senate Avenue  
MC 61-53 IGCN 1003  
Indianapolis, Indiana 46204-2251

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date. The notification submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).
- (c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ if the Permittee submits to IDEM, OAQ a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period.

#### **Compliance Requirements [326 IAC 2-1.1-11]**

##### **C.9 Compliance Requirements [326 IAC 2-1.1-11]**

---

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

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

##### **C.10 Compliance Monitoring [326 IAC 2-7-5(3)][326 IAC 2-7-6(1)]**

---

Unless otherwise specified in this permit, for all monitoring requirements not already legally required, the Permittee shall be allowed up to ninety (90) days from the date of permit issuance or of initial start-up, whichever is later, to begin such monitoring. If due to circumstances beyond the Permittee's control, any monitoring equipment required by this permit cannot be installed and operated no later than ninety (90) days after permit issuance or the date of initial startup, whichever is later, the Permittee may extend the compliance schedule related to the equipment for an additional ninety (90) days provided the Permittee notifies:

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

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

The notification which shall be submitted by the Permittee does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

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

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

---

- (a) When required by any condition of this permit, an analog instrument used to measure a parameter related to the operation of an air pollution control device shall have a scale such that the expected maximum reading for the normal range 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 2-7-5][326 IAC 2-7-6]**

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

**C.13 Risk Management Plan [326 IAC 2-7-5(12)] [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 2-7-5] [326 IAC 2-7-6]**

---

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

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

- (e) The Permittee shall record the reasonable response steps taken.

**C.15 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5][326 IAC 2-7-6]**

---

- (a) When the results of a stack test performed in conformance with Section C - Performance Testing, of this permit exceed the level specified in any condition of this permit, the Permittee shall submit a description of its response actions to IDEM, OAQ, no later than seventy-five (75) days after the date of the test.
- (b) A retest to demonstrate compliance shall be performed no later than one hundred eighty (180) days after the date of the test. Should the Permittee demonstrate to IDEM, OAQ that retesting in one hundred eighty (180) days is not practicable, IDEM, OAQ may extend the retesting deadline
- (c) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

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

**C.16 Emission Statement [326 IAC 2-7-5(3)(C)(iii)][326 IAC 2-7-5(7)][326 IAC 2-7-19(c)][326 IAC 2-6]**

---

Pursuant to 326 IAC 2-6-3(b)(3), starting in 2006 and every three (3) years thereafter, the Permittee shall submit by July 1 an emission statement covering the previous calendar year. The emission statement shall contain, at a minimum, the information specified in 326 IAC 2-6-4(c) and shall meet the following requirements:

- (1) Indicate estimated actual emissions of all pollutants listed in 326 IAC 2-6-4(a);
- (2) Indicate estimated actual emissions of regulated pollutants as defined by 326 IAC 2-7-1(32) ("Regulated pollutant, which is used only for purposes of Section 19 of this rule") from the source, for purpose of fee assessment.

The statement must be submitted to:

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

The emission statement does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

**C.17 General Record Keeping Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-6]**

---

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

**C.18 General Reporting Requirements [326 IAC 2-7-5(3)(C)] [326 IAC 2-1.1-11]**

---

- (a) The Permittee shall submit the attached Quarterly Deviation and Compliance Monitoring Report or its equivalent. Any deviation from permit requirements, the date(s) of each deviation, the cause of the deviation, and the response steps taken must be reported except that a deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report. This report shall be submitted not later than thirty (30) days after the end of the reporting period. The Quarterly Deviation and Compliance Monitoring Report shall include a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34). A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.
  
- (b) The address for report submittal is:  
  
Indiana Department of Environmental Management  
Compliance and Enforcement Branch, Office of Air Quality  
100 North Senate Avenue  
MC 61-53 IGCN 1003  
Indianapolis, Indiana 46204-2251
  
- (c) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
  
- (d) Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

**Stratospheric Ozone Protection**

**C.19 Compliance with 40 CFR 82 and 326 IAC 22-1**

---

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

## SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

### Emissions Unit Description:

- (a) Surface coating line 1 operations (booths EU 01 through EU 12) consisting of the following:
- (1) One (1) contact glue booth (EU 01) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack A. This booth was installed prior to 1974.
  - (2) Three (3) stain booths (EU 02, EU 03 and EU 04) with a maximum throughput rate of 3 units per hour each, controlled by dry filters and exhausting at stacks B, C and D. These booths were installed prior to 1974.
  - (3) One (1) wipe stain booth (EU 05) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack E. This booth was installed prior to 1974.
  - (4) One (1) sealer booth (EU 06) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack F. This booth was installed prior to 1974.
  - (5) One (1) lacquer booth (EU 07) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack G. This booth was installed prior to 1974.
  - (6) One (1) lacquer booth (EU 08) with a maximum throughput rate of 8 units per hour, controlled by dry filters and exhausting at stack H. This booth was installed prior to 1974.
  - (7) One (1) wipe stain booth (EU 09) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack I. This booth was installed prior to 1974.
  - (8) One (1) lacquer booth (EU 10) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack J. This booth was installed prior to 1974.
  - (9) One (1) black enamel booth (EU 11) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack K. This booth was installed in 1998.
  - (10) One (1) stain booth (EU 12) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack L. This booth was installed prior to 1974.

Under 40 CFR 63, Subpart JJ, the surface coating line 1, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (a) refers to desks and desktops.

- (b) Surface coating line 2 operation consisting of the following:
- (1) One (1) SAP/NGR Booth (identified as EU 21/EU 22) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stacks 2A and 2B. This booth was installed in 2000.

- (2) One (1) Wash Coat Booth (identified as EU 23) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2C. This booth was installed in 2000.
- (3) One (1) Stain Booth (identified as EU 25) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (4) One (1) Sealer Booth (identified as EU 27) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (5) One (1) First Topcoat Booth with one (1) flash tunnel (identified as EU 29) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2H. The flash tunnel exhausts at stack 21. This booth was installed in 2000.
- (6) One (1) Second Topcoat Booth with one (1) flash tunnel (identified as EU 30) with a maximum rated capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2J. The flash tunnel exhausts at stack 2K. This booth and flash tunnel were installed in 2000.

Under 40 CFR 63, Subpart JJ, the surface coating line 2, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (b) refers to desks and desktops.

(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 2-7-5(1)]**

#### **D.1.1 PSD Minor Limit [326 IAC 2-2]**

The use of VOC, including coatings, dilution solvents, and cleaning solvents shall be less than 249 tons per twelve (12) consecutive month period with compliance determined at the end of each month. This usage limit is required to limit the potential to emit of VOC to less than 249 tons per twelve (12) consecutive month period.

#### **D.1.2 Volatile Organic Compounds (VOC) [326 IAC 8-2-12]**

Pursuant to 326 IAC 8-2-12, with the exception of no more than ten (10) gallons of coating per day used for touch-up and repair operations, the one (1) black enamel booth (EU 11) of surface coating line 1 and the entire surface coating line 2 operations (EU 21, 22, 23, 25, 27, 29, and 30), applying coating to wood furniture shall utilize one (1) of the following application methods:

- Airless Spray Application
- Air Assisted Airless Spray Application
- Electrostatic Spray Application
- Electrostatic Bell or Disc Application
- Heated Airless Spray Application
- Roller Coating
- Brush or Wipe Application
- Dip-and-Drain Application

High Volume Low Pressure (HVLP) Spray Application is an accepted alternative method of application for Air Assisted Airless Spray Application. HVLP spray is the technology used to apply coating to substrate by means of coating application equipment which operates between one-tenth (0.1) and ten

(10) pounds per square inch gauge (psig) air pressure measured dynamically at the center of the air cap and at the air horns of the spray system.

**D.1.3 Particulate Matter (PM) [326 IAC 6.5-1-2]**

Pursuant to 326 IAC 6.5-1-2(a), the surface coating operations shall not allow or permit discharge to the atmosphere of any gases which contain particulate matter in excess of three hundredths (0.03) grain per dry standard cubic feet.

**D.1.4 Preventive Maintenance Plan [326 IAC 2-7-5(13)]**

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

**Compliance Determination Requirements**

**D.1.5 Volatile Organic Compounds (VOC) [326 IAC 8-1-4] [326 IAC 8-1-2(a)]**

Compliance with the VOC usage limitations contained in Condition D.1.1 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 reserves the authority to determine compliance using Method 24 in conjunction with the analytical procedures specified in 326 IAC 8-1-4.

**D.1.6 Particulate Control**

In order to comply with Condition D.3.1, a dry particulate filter for PM control shall be in operation and control emissions at all times the associated surface coating operations are in operation.

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

**D.1.7 Monitoring**

- (a) Daily inspections shall be performed to verify the placement, integrity and particle loading of the filters. To monitor the performance of the dry filters, weekly observations shall be made of the overspray from the surface coating booth stacks (stacks 2A, 2B, 2C, 2F, 2H, 2J, and K) while one or more of the booths are in operation. If a condition exists which should result in a response step, the Permittee shall take a reasonable response step. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.
- (b) Monthly inspections shall be performed of the coating emissions from each stack and the presence of overspray on the rooftops and the nearby ground. When there is a noticeable change in overspray emissions, or when evidence of overspray emissions is observed, the Permittee shall take reasonable response steps. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

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

**D.1.8 Record Keeping Requirements**

- (a) To document the compliance status with Condition D.1.1, the Permittee shall maintain records in accordance with (1) through (3) below. Records maintained for (1) through (3) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC usage limits established in Condition D.1.1. Records necessary to demonstrate compliance shall be available within 30 days of the end of each compliance period.
  - (1) The amount of coating material and solvent less water used on monthly basis. Records shall include purchase orders, invoices, and material safety data sheets (MSDS) necessary to verify the type and amount used.

- (2) The total VOC usage for each month; and
  - (3) The weight of VOCs emitted for each compliance period.
- (b) To document the compliance status with Condition D.1.7, the Permittee shall maintain a log of weekly overspray observations, daily and monthly inspections. The Permittee shall include in its weekly record when a weekly overspray observation is not taken and the reason for the lack of weekly overspray observations (i.e., the process did not operate that week).
- (c) Section C - General Record Keeping Requirements contains the Permittee's obligations with regard to the records required by this condition.

#### D.1.9 Reporting Requirements

---

A quarterly summary of the information to document the compliance status with Condition D.1.1 shall be submitted to the addresses listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official" as defined by 326 IAC 2-7-1(34).

## SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

### Emissions Unit Description:

- (c) One (1) Final Touch-up Sanding Booth (identified as EU 32) with a maximum throughput capacity of 7.50 tons of wood per hour and controlled by cartridge filters.

(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 2-7-5(1)]

#### D.2.1 Particulate Matter (PM) [326 IAC 6.5-1-2]

Pursuant to 326 IAC 6.5-1-2(a), particulate matter (PM) emissions from the one (1) final touch-up sanding booth shall be limited to 0.03 grain per dry standard cubic foot of exhaust air.

#### D.2.2 Preventive Maintenance Plan [326 IAC 2-7-5(13)]

A Preventive Maintenance Plan is required for the Final Touch-up Sanding Booth and their cartridge filters. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

### Compliance Determination Requirements

#### D.2.3 Particulate Control

In order to comply with Condition D.2.1, the cartridge filters for PM control shall be in operation and control emissions at all times the associated final touch-up sanding booth is in operation.

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

#### D.2.4 Visible Emissions Notations

- (a) Daily visible emission notations of the final touch-up sanding booth stack exhaust shall be performed during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.
- (b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
- (c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to 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 a reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

#### D.2.5 Parametric Monitoring

The Permittee shall record the pressure drop across the cartridge filters used in conjunction with the final touch-up sanding booth, at least once per day when the final touch-up sanding booth is in operation when venting to the atmosphere. When for any one (1) reading, the pressure drop across the baghouse is outside the normal range of 2.0 and 8.0 inches of water or a range established during the latest stack test, the Permittee shall take a reasonable response step. Section C - Response to

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

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

#### D.2.6 Broken or Failed Bag Detection

---

- (a) For a single compartment baghouses 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 emissions 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 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 2-7-5(3)] [326 IAC 2-7-19]**

#### D.2.7 Record Keeping Requirements

---

- (a) To document the compliance status with Condition D.2.4, the Permittee shall maintain daily records of visible emission notations of the final touch-up sanding booth stack exhaust when venting to the atmosphere. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of a visible emission notation, (i.e. the process did not operate that day).
- (b) The Permittee shall maintain records of the dates when the final touch-up sanding booth stack exhaust are redirected.
- (c) To document the compliance status with Condition D.2.5, the Permittee shall maintain daily records of the pressure drop during normal operation when venting to the atmosphere.
- (d) Section C - General Record Keeping Requirements contains the Permittee's obligations with regard to the records required by this condition.

## SECTION D.3 EMISSIONS UNIT OPERATION CONDITIONS

### **Emissions Unit Description:** Insignificant Woodworking Operations and Repair Sanding Booth

- (a) Woodworking operations (identified as EU 14) with a maximum throughput rate of 2,750 pounds of wood per hour, controlled by a baghouse and exhausting at stack N. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6-1-5-1-2]
- (b) One (1) repair sanding booth (identified as EU 15), with a maximum capacity of ten (10) units per hour, installed in 1995, controlled by a baghouse and exhausting within the building. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6.5-1-2(a)]

(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 2-7-5(1)]**

#### D.3.1 Baghouse Limitations [326 IAC 2-7-1(21)(G)(xxix)]

Pursuant to T037-6048-00012, issued December 21, 1998, the woodworking operations (EU 14) and repair sanding booth (EU 15), each controlled by a baghouse, shall be an insignificant activity for Title V permitting purposes provided that the baghouse operations meet the following requirements:

- (a) The woodworking baghouse shall not exhaust to the atmosphere greater than one hundred twenty-five thousand (125,000) cubic feet of air per minute and shall not emit particulate matter with a diameter less than ten (10) microns ( $PM_{10}$ ) in excess of three-thousandths (0.003) grain per dry standard cubic foot of outlet air.
- (b) The opacity from the baghouse shall not exceed ten percent (10%).
- (c) Visible emissions from the baghouse shall be observed daily, when venting to the atmosphere, using procedures in accordance with Method 22, and normal or abnormal emissions are recorded.
- (d) In the event abnormal emissions are observed for greater than six (6) minutes in duration, the baghouse shall be inspected, and corrective actions, such as replacing or reseating bags, shall be initiated when necessary.

#### D.3.2 Particulate Matter (PM) [326 IAC 6.5-1-2]

- (a) Pursuant to 326 IAC 6.5-1-2(a), the woodworking facilities (EU 14) shall not allow or permit discharge to the atmosphere of any gases which contain particulate matter in excess of three hundredths (0.03) grain per dry standard cubic foot of outlet air.
- (b) Pursuant to 326 IAC 6.5-1-2(a), the repair sanding booth (EU 15) shall not allow or permit discharge to the atmosphere of any gases which contain particulate matter in excess of three hundredths (0.03) grain per dry standard cubic foot of outlet air.

#### D.3.3 Preventive Maintenance Plan [326 IAC 2-7-5(13)]

A Preventive Maintenance Plan is required for the woodworking facilities (EU 14), repair sanding booth (EU 15), and their baghouses. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

## Compliance Determination Requirements

### D.3.4 Particulate Control [326 IAC 2-7-21(1)(G)(xxix)(DD)]

---

- (a) In order to comply with Conditions D.3.1 and D.3.2, the baghouses for PM control shall be in operation and control emissions at all times the associated woodworking facilities (EU 14) and repair sanding booth (EU 15) are in operation.
- (b) In the event that bag failure is observed in a multi-compartment baghouse, if operations will continue for ten (10) days or more after the failure is observed before the failed units will be repaired or replaced, the Permittee shall promptly notify the IDEM, OAQ of the expected date the failed units will be repaired or replaced. The notification shall also include the status of the applicable compliance monitoring parameters with respect to normal, and the results of any response actions taken up to the time of notification.

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

### D.3.5 Visible Emissions Notations

---

- (a) Daily visible emission notations of the woodworking facility stack exhaust (stack N) and repair sanding booth stack exhaust shall be performed during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.
- (b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
- (c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to 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 a reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

### D.3.6 Baghouse Inspections [326 IAC 2-7-21(1)(G)(xxix)(FF)]

---

An inspection shall be performed each calendar quarter of all bags controlling the woodworking facilities and repair sanding booth when venting to the atmosphere. A baghouse inspection shall be performed within three (3) months of redirecting vents to the atmosphere and every three (3) months thereafter. Inspections are optional when venting to the indoors. Inspections required by this condition shall not be performed in consecutive months. All defective bags shall be replaced.

### D.3.7 Broken or Failed Bag Detection

---

- (a) For a single compartment baghouse controlling emissions from a process operated continuously, a failed unit and the associated process shall be shut down immediately until the failed unit has been repaired or replaced. Operations may continue only if the event qualifies as an emergency and the Permittee satisfies the requirements of the emergency provisions of this permit (Section B - Emergency Provisions).
- (b) For a single compartment baghouse controlling emissions from a batch process, the feed to the process shall be shut down immediately until the failed unit has been repaired or replaced. The emissions unit shall be shut down no later than the completion of the processing of the material in the emissions 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 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 2-7-5(3)] [326 IAC 2-7-19]**

#### **D.3.8 Record Keeping Requirements**

---

- (a) To document the compliance status with Conditions D.3.1(d) and D.3.6, the Permittee shall maintain records of the results of the inspections required under Conditions D.3.1(d) and D.3.6, and the dates the vents are redirected.
- (b) To document the compliance status with Conditions D.3.1(c) and D.3.5, the Permittee shall maintain records of daily visible emission notations of the baghouse exhaust when venting to the atmosphere. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of a visible emission notation, (i.e. the process did not operate that day).
- (c) The Permittee shall maintain records of corrective actions to document compliance with 326 IAC 2-7-21(1)(G)(xxix)(GG)(dd).
- (d) Section C - General Record Keeping Requirements contains the Permittee's obligations with regard to the records required by this condition.

## SECTION D.4 EMISSIONS UNIT OPERATION CONDITIONS

### Emissions Unit Description:

- (b) One (1) natural gas-fired boiler (identified as EU 13) with a maximum heat input capacity of 2.60 MMBtu per hour and exhausting at stack M. [326 IAC 6.5-1-2(a)]
- (c) One (1) natural gas-fired air makeup unit utilized for general building ventilation (identified as EU 33) with a maximum heat input capacity of 2.10 MMBtu per hour, and exhausting externally. [326 IAC 6.5-1-2(a)]
- (d) Seven (7) natural gas-fired air makeup units, two (2) integrated with the SAP/NGR Booth and one (1) integrated with each of the other five (5) surface coating booths located on the second surface coating line operations, each with a maximum heat input capacity of 1.50 MMBtu per hour and exhausting internally into the booth. [326 IAC 6.5-1-2(a)]
- (e) Two (2) natural gas-fired drying ovens (identified as EU 26 and EU 31) used in conjunction with the second surface coating line operations and each with a maximum heat input capacity of 1.00 MMBtu per hour. The ovens EU 26 and EU 31 exhaust at stacks 2E and 2L, respectively, and were installed in 2000. [326 IAC 6.5-1-2(a)]
- (f) One (1) natural gas-fired drying oven (identified as EU 28) used in conjunction with the second surface coating line operations and with a maximum heat input capacity of 4.0 MMBtu per hour. This oven exhausts at stacks 2G-1, 2G-2, and 2G-3, and was installed in 2000. [326 IAC 6.5-1-2(a)]

(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 2-7-5(1)]

#### D.4.1 Particulate [326 IAC 6.5-1-2]

- (a) Pursuant to 326 IAC 6.5-1-2(b)(3), particulate matter emissions from the 2.60 MMBtu per hour natural gas fired boiler shall not exceed one-hundredth (0.01) grains per dry standard cubic foot.
- (b) Pursuant to 326 IAC 6.5-1-2(a), particulate matter emissions from the eight (8) air makeup units and three (3) drying ovens (EU 26, EU 31, and EU 28) shall not exceed three hundredth (0.03) grains per dry standard cubic foot.

## SECTION E.1 National Emission Standards for Hazardous Air Pollutants (NESHAP)

### Emissions Unit Description: Wood surface coating operations

- (a) Surface coating line 1 operations (booths EU 01 through EU 12) consisting of the following:
- (1) One (1) contact glue booth (EU 01) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack A. This booth was installed prior to 1974.
  - (2) Three (3) stain booths (EU 02, EU 03 and EU 04) with a maximum throughput rate of 3 units per hour each, controlled by dry filters and exhausting at stacks B, C and D. These booths were installed prior to 1974.
  - (3) One (1) wipe stain booth (EU 05) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack E. This booth was installed prior to 1974.
  - (4) One (1) sealer booth (EU 06) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack F. This booth was installed prior to 1974.
  - (5) One (1) lacquer booth (EU 07) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack G. This booth was installed prior to 1974.
  - (6) One (1) lacquer booth (EU 08) with a maximum throughput rate of 8 units per hour, controlled by dry filters and exhausting at stack H. This booth was installed prior to 1974.
  - (7) One (1) wipe stain booth (EU 09) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack I. This booth was installed prior to 1974.
  - (8) One (1) lacquer booth (EU 10) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack J. This booth was installed prior to 1974.
  - (9) One (1) black enamel booth (EU 11) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack K. This booth was installed in 1998.
  - (10) One (1) stain booth (EU 12) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack L. This booth was installed prior to 1974.

Under 40 CFR 63, Subpart JJ, the surface coating line 1, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (a) refers to desks and desktops.

- (b) Surface coating line 2 operation consisting of the following:
- (1) One (1) SAP/NGR Booth (identified as EU 21/EU 22) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stacks 2A and 2B. This booth was installed in 2000.

- (2) One (1) Wash Coat Booth (identified as EU 23) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2C. This booth was installed in 2000.
- (3) One (1) Stain Booth (identified as EU 25) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (4) One (1) Sealer Booth (identified as EU 27) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (5) One (1) First Topcoat Booth with one (1) flash tunnel (identified as EU 29) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2H. The flash tunnel exhausts at stack 21. This booth was installed in 2000.
- (6) One (1) Second Topcoat Booth with one (1) flash tunnel (identified as EU 30) with a maximum rated capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2J. The flash tunnel exhausts at stack 2K. This booth and flash tunnel were installed in 2000.

Under 40 CFR 63, Subpart JJ, the surface coating line 2, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (b) refers to desks and desktops.

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

#### **National Emission Standards for Hazardous Air Pollutants (NESHAP) Requirements [326 IAC 2-7-5(1)]**

##### **E.1.1 General Provisions Relating to National Emission Standards for Hazardous Air Pollutants under 40 CFR Part 63 [326 IAC 20-1][40 CFR Part 63, Subpart A]**

- (a) Pursuant to 40 CFR 63.1, the Permittee shall comply with the provisions of 40 CFR Part 63 Subpart A – General Provisions, which are incorporated by reference as 326 IAC 20-1-1 for wood surface coating operations, identified as surface coating line 1 and surface coating line 2, except as otherwise specified in 40 CFR Part 63, Subpart JJ.
- (b) Pursuant to 40 CFR 63.9, the Permittee shall submit all required notifications and reports to:

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

##### **E.1.2 National Emission Standards for Hazardous Air Pollutants (NESHAP) [40 CFR 63, Subpart JJ]**

Pursuant to 40 CFR Part 63, Subpart JJ, the Permittee shall comply with the following provisions of 40 CFR Part 63, Subpart JJ, National Emission Standards for Wood Furniture Manufacturing Operations (included as Attachment A to this permit), for the wood surface coating operations, identified as surface coating line 1 and surface coating line 2, as follows:

- (1) 40 CFR 63.800
- (2) 40 CFR 63.801
- (3) 40 CFR 63.802(a)(1)

- (4) 40 CFR 63.802(a)(2)
- (5) 40 CFR 63.802(a)(3)
- (6) 40 CFR 63.803
- (7) 40 CFR 63.804(a)(1),(2), and (4)
- (8) 40 CFR 63.804(b)
- (9) 40 CFR 63.804(c)(1)
- (10) 40 CFR 63.804(g)(1), (2), (5), (7), and (8)
- (11) 40 CFR 63.806(a), (b), (c), (e), (h), (i), and (j)
- (12) 40 CFR 63.807(a), (c), and (e)
- (13) 40 CFR 63.808

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT  
OFFICE OF AIR QUALITY  
COMPLIANCE AND ENFORCEMENT BRANCH  
PART 70 OPERATING PERMIT  
CERTIFICATION**

Source Name: Inwood Office Furniture Co., Inc.  
Source Address: 1108 East 15th Street, Jasper, Indiana 47546  
Part 70 Permit No.: T037-29306-00012

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

Please check what document is being certified:

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

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

Signature:

Printed Name:

Title/Position:

Phone:

Date:

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

**PART 70 OPERATING PERMIT**  
**EMERGENCY OCCURRENCE REPORT**

Source Name: Inwood Office Furniture Co., Inc.  
Source Address: 1108 East 15th Street, Jasper, Indiana 47546  
Part 70 Permit No.: T037-29306-00012

**This form consists of 2 pages**

**Page 1 of 2**

- This is an emergency as defined in 326 IAC 2-7-1(12)
- The Permittee must notify the Office of Air Quality (OAQ), within four (4) business hours (1-800-451-6027 or 317-233-0178, ask for Compliance Section); and
  - The Permittee must submit notice in writing or by facsimile within two (2) working days (Facsimile Number: 317-233-6865), and follow the other requirements of 326 IAC 2-7-16.

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

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

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

**Page 2 of 2**

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

Form Completed by: \_\_\_\_\_

Title / Position: \_\_\_\_\_

Date: \_\_\_\_\_

Phone: \_\_\_\_\_

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

**Part 70 Quarterly Report**

Source Name: Inwood Office Furniture Co., Inc.  
Source Address: 1108 East 15th Street, Jasper, Indiana 47546  
Part 70 Permit No.: T037-29306-00012  
Facility: Surface Coating Operations: Coating Lines 1 and 2  
Parameter: VOC Usage  
Limit: Less than 249 tons VOC per twelve (12) consecutive month period with compliance determined at the end of each month

QUARTER:

YEAR:

Month	Column 1	Column 2	Column 1 + Column 2
	This Month	Previous 11 Months	12 Month Total
Month 1			
Month 2			
Month 3			

No deviation occurred in this quarter.

Deviation/s occurred in this quarter.  
Deviation has been reported on:

Submitted by: \_\_\_\_\_

Title / Position: \_\_\_\_\_

Signature: \_\_\_\_\_

Date: \_\_\_\_\_

Phone: \_\_\_\_\_

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT  
 OFFICE OF AIR QUALITY  
 COMPLIANCE AND ENFORCEMENT BRANCH  
 PART 70 OPERATING PERMIT  
 QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT**

Source Name: Inwood Office Furniture Co., Inc.  
 Source Address: 1108 East 15th Street, Jasper, Indiana 47546  
 Part 70 Permit No.: T037-29306-00012

**Months:** \_\_\_\_\_ **to** \_\_\_\_\_ **Year:** \_\_\_\_\_

<p>This report shall be submitted quarterly based on a calendar year. Any deviation from the requirements of this permit, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. A deviation required to be reported pursuant to an applicable requirement that exists independent of the permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report. Additional pages may be attached if necessary. If no deviations occurred, please specify in the box marked "No deviations occurred this reporting period".</p>	
<input type="checkbox"/> NO DEVIATIONS OCCURRED THIS REPORTING PERIOD.	
<input type="checkbox"/> THE FOLLOWING DEVIATIONS OCCURRED THIS REPORTING PERIOD	
<b>Permit Requirement</b> (specify permit condition #)	
<b>Date of Deviation:</b>	<b>Duration of Deviation:</b>
<b>Number of Deviations:</b>	
<b>Probable Cause of Deviation:</b>	
<b>Response Steps Taken:</b>	
<b>Permit Requirement</b> (specify permit condition #)	
<b>Date of Deviation:</b>	<b>Duration of Deviation:</b>
<b>Number of Deviations:</b>	
<b>Probable Cause of Deviation:</b>	
<b>Response Steps Taken:</b>	

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

Form Completed by: \_\_\_\_\_

Title / Position: \_\_\_\_\_

Date: \_\_\_\_\_

Phone: \_\_\_\_\_

**Attachment A**  
**to Part 70 Operating Permit Renewal No. T037-29306-00012**

Inwood Office Furniture Co., Inc.  
1108 East 15th Street, Jasper, Indiana 47546

**40 CFR 63, Subpart JJ—National Emission Standards for Wood Furniture Manufacturing Operations**

**Source:** 60 FR 62936, Dec. 7, 1995, unless otherwise noted.

**§ 63.800 Applicability.**

(a) The affected source to which this subpart applies is each facility that is engaged, either in part or in whole, in the manufacture of wood furniture or wood furniture components and that is located at a plant site that is a major source as defined in 40 CFR part 63, subpart A, §63.2. The owner or operator of a source that meets the definition for an incidental wood furniture manufacturer shall maintain purchase or usage records demonstrating that the source meets the definition in §63.801 of this subpart, but the source shall not be subject to any other provisions of this subpart.

(b) A source that complies with the limits and criteria specified in paragraphs (b)(1), (b)(2), or (b)(3) of this section is an area source for the purposes of this subpart and is not subject to any other provision of this rule, provided that: In the case of paragraphs (b)(1) and (b)(2), finishing materials, adhesives, cleaning solvents and washoff solvents used for wood furniture or wood furniture component manufacturing operations account for at least 90 percent of annual HAP emissions at the plant site, and if the plant site has HAP emissions that do not originate from the listed materials, the owner or operator shall keep any records necessary to demonstrate that the 90 percent criterion is being met. A source that initially relies on the limits and criteria specified in paragraphs (b)(1), (b)(2), and (b)(3) to become an area source, but subsequently exceeds the relevant limit (without first obtaining and complying with other limits that keep its potential to emit hazardous air pollutants below major source levels), becomes a major source and must comply thereafter with all applicable provisions of this subpart starting on the applicable compliance date in §63.800. Nothing in this paragraph (b) is intended to preclude a source from limiting its potential to emit through other appropriate mechanisms that may be available through the permitting authority.

(1) The owner or operator of the source uses no more than 250 gallons per month, for every month, of coating, gluing, cleaning, and washoff materials at the source, including materials used for source categories other than wood furniture (surface coating), but excluding materials used in routine janitorial or facility grounds maintenance, personal uses by employees or other persons, the use of products for the purpose of maintaining motor vehicles operated by the facility, or the use of toxic chemicals contained in intake water (used for processing or non-contact cooling) or intake air (used either as compressed air or for combustion). The owner or operator shall maintain records of the total gallons of coating, gluing, cleaning, and washoff materials used each month, and upon request submit such records to the Administrator. These records shall be maintained for five years.

(2) The owner or operator of the source uses no more than 3,000 gallons per rolling 12-month period, for every 12-month period, of coating, gluing, cleaning, and washoff materials at the source, including materials used for source categories other than wood furniture (surface coating), but excluding materials used in routine janitorial or facility grounds maintenance, personal uses by employees or other persons, the use of products for the purpose of maintaining motor vehicles operated by the facility, or the use of toxic chemicals contained in intake water (used for processing or non-contact cooling) or intake air (used either as compressed air or for combustion). A rolling 12-month period includes the previous 12 months of operation. The owner or operator of the source shall maintain records of the total gallons of coating, gluing, cleaning, and washoff materials used each month and the total gallons used each previous month, and upon request submit such records to the Administrator. Because records are needed over the previous set of 12 months, the owner or operator shall keep monthly records beginning no less than one year before the compliance date specified in §63.800(e). Records shall be maintained for five years.

(3) The source emits no more than 4.5 Mg (5 tons) of any one HAP per rolling 12-month period and no more than 11.4 Mg (12.5 tons) of any combination of HAP per rolling 12-month period, and at least 90 percent of the plant-wide

emissions per rolling 12-month period are associated with the manufacture of wood furniture or wood furniture components.

(c) This subpart does not apply to research or laboratory facilities as defined in §63.801.

(d) Owners or operators of affected sources shall also comply with the requirements of subpart A of this part (General Provisions), according to the applicability of subpart A to such sources, as identified in Table 1 of this subpart.

(e) The compliance date for existing affected sources that emit less than 50 tons per year of HAP in 1996 is December 7, 1998. The compliance date for existing affected sources that emit 50 tons or more of hazardous air pollutants in 1996 is November 21, 1997. The owner or operator of an existing area source that increases its emissions of (or its potential to emit) HAP such that the source becomes a major source that is subject to this subpart shall comply with this subpart one year after becoming a major source.

(f) New affected sources must comply with the provisions of this standard immediately upon startup or by December 7, 1995, whichever is later. New area sources that become major sources shall comply with the provisions of this standard immediately upon becoming a major source.

(g) Reconstructed affected sources are subject to the requirements for new affected sources. The costs associated with the purchase and installation of air pollution control equipment (e.g., incinerators, carbon adsorbers, etc.) are not considered in determining whether the facility has been reconstructed, unless the control equipment is required as part of the process (e.g., product recovery). Additionally, the costs of retrofitting and replacement of equipment that is installed specifically to comply with this subpart are not considered reconstruction costs. For example, an affected source may convert to waterborne coatings to meet the requirements of this subpart. At most facilities, this conversion will require the replacement of existing storage tanks, mix equipment, and transfer lines. The cost of replacing the equipment is not considered in determining whether the facility has been reconstructed.

[60 FR 62936, Dec. 7, 1995, as amended at 62 FR 30259, June 3, 1997]

## **§ 63.801 Definitions.**

(a) All terms used in this subpart that are not defined below have the meaning given to them in the CAA and in subpart A (General Provisions) of this part.

*Adhesive* means any chemical substance that is applied for the purpose of bonding two surfaces together other than by mechanical means. Under this subpart, adhesives shall not be considered coatings or finishing materials. Products used on humans and animals, adhesive tape, contact paper, or any other product with an adhesive incorporated onto or in an inert substrate shall not be considered adhesives under this subpart.

*Administrator* means the Administrator of the United States Environmental Protection Agency or his or her authorized representative.

*Aerosol adhesive* means an adhesive that is dispensed from a pressurized container as a suspension of fine solid or liquid particles in gas.

*Affected source* means a wood furniture manufacturing facility that is engaged, either in part or in whole, in the manufacture of wood furniture or wood furniture components and that is located at a plant site that is a major source as defined in 40 CFR part 63.2, excluding sources that meet the criteria established in §63.800(a), (b) and (c) of this subpart.

*Alternative method* means any method of sampling and analyzing for an air pollutant that is not a reference or equivalent method but has been demonstrated to the Administrator's satisfaction to, in specific cases, produce results adequate for a determination of compliance.

*As applied* means the HAP and solids content of the coating or contact adhesive that is actually used for coating or gluing the substrate. It includes the contribution of materials used for in-house dilution of the coating or contact adhesive.

*Basecoat* means a coat of colored material, usually opaque, that is applied before graining inks, glazing coats, or other opaque finishing materials, and is usually topcoated for protection.

*Baseline conditions* means the conditions that exist prior to an affected source implementing controls, such as a control system.

*Building enclosure* means a building housing a process that meets the requirements of a temporary total enclosure. The EPA Method 204E is used to identify all emission points from the building enclosure and to determine which emission points must be tested. For additional information see *Guidelines for Determining Capture Efficiency*, January 1994. Docket No. A-93-10, Item No. IV-B-1.

*Capture device* means a hood, enclosed room, floor sweep, or other means of collecting solvent emissions or other pollutants into a duct so that the pollutant can be directed to a pollution control device such as an incinerator or carbon adsorber.

*Capture efficiency* means the fraction of all organic vapors generated by a process that are directed to a control device.

*Certified product data sheet (CPDS)* means documentation furnished by coating or adhesive suppliers or an outside laboratory that provides:

- (1) The VHAP content of a finishing material, contact adhesive, or solvent, by percent weight, measured using the EPA Method 311 (as promulgated in this subpart), or an equivalent or alternative method (or formulation data if the coating meets the criteria specified in §63.805(a));
- (2) The solids content of a finishing material or contact adhesive by percent weight, determined using data from the EPA Method 24, or an alternative or equivalent method (or formulation data if the coating meets the criteria specified in §63.805 (a)); and
- (3) The density, measured by EPA Method 24 or an alternative or equivalent method. Therefore, the reportable VHAP content shall represent the maximum aggregate emissions potential of the finishing material, adhesive, or solvent in concentrations greater than or equal to 1.0 percent by weight or 0.1 percent for VHAP that are carcinogens, as defined by the Occupational Safety and Health Administration Hazard Communication Standard (29 CFR part 1910), as formulated. Only VHAP present in concentrations greater than or equal to 1.0 percent by weight, or 0.1 percent for VHAP that are carcinogens, must be reported on the CPDS. The purpose of the CPDS is to assist the affected source in demonstrating compliance with the emission limitations presented in §63.802.

Note: Because the optimum analytical conditions under EPA Method 311 vary by coating, the coating or adhesive supplier may also choose to include on the CPDS the optimum analytical conditions for analysis of the coating, adhesive, or solvent using EPA Method 311. Such information may include, but not be limited to, separation column, oven temperature, carrier gas, injection port temperature, extraction solvent, and internal standard.)

*Cleaning operations* means operations in which organic HAP solvent is used to remove coating materials or adhesives from equipment used in wood furniture manufacturing operations.

*Coating* means a protective, decorative, or functional film applied in a thin layer to a surface. Such materials include, but are not limited to, paints, topcoats, varnishes, sealers, stains, washcoats, basecoats, enamels, inks, and temporary protective coatings. Aerosol spray paints used for touch-up and repair are not considered coatings under this subpart.

*Coating application station* means the part of a coating operation where the coating is applied, e.g., a spray booth.

*Coating operation* means those activities in which a coating is applied to a substrate and is subsequently air-dried, cured in an oven, or cured by radiation.

*Coating solids (or solids)* means the part of the coating which remains after the coating is dried or cured; solids content is determined using data from the EPA Method 24, or an equivalent or alternative method.

*Compliant coating/contact adhesive* means a finishing material, contact adhesive, or strippable booth coating that meets the emission limits specified in Table 3 of this subpart.

*Contact adhesive* means an adhesive that is applied to two substrates, dried, and mated under only enough pressure to result in good contact. The bond is immediate and sufficiently strong to hold pieces together without further clamping, pressure, or airing.

*Continuous coater* means a finishing system that continuously applies finishing materials onto furniture parts moving along a conveyor. Finishing materials that are not transferred to the part are recycled to a reservoir. Several types of application methods can be used with a continuous coater including spraying, curtain coating, roll coating, dip coating, and flow coating.

*Continuous compliance* means that the affected source is meeting the emission limitations and other requirements of the rule at all times and is fulfilling all monitoring and recordkeeping provisions of the rule in order to demonstrate compliance.

*Control device* means any equipment that reduces the quantity of a pollutant that is emitted to the air. The device may destroy or secure the pollutant for subsequent recovery. Includes, but is not limited to, incinerators, carbon adsorbers, and condensers.

*Control device efficiency* means the ratio of the pollutant released by a control device and the pollutant introduced to the control device.

*Control system* means the combination of capture and control devices used to reduce emissions to the atmosphere.

*Conventional air spray* means a spray coating method in which the coating is atomized by mixing it with compressed air and applied at an air pressure greater than 10 pounds per square inch (gauge) at the point of atomization. Airless and air assisted airless spray technologies are not conventional air spray because the coating is not atomized by mixing it with compressed air. Electrostatic spray technology is also not considered conventional air spray because an electrostatic charge is employed to attract the coating to the workpiece.

*Data quality objective (DQO) approach* means a set of approval criteria that must be met so that data from an alternative test method can be used in determining the capture efficiency of a control system. For additional information, see *Guidelines for Determining Capture Efficiency*, January 1994. (Docket No. A-93-10, Item No. IV-B-1).

*Day* means a period of 24 consecutive hours beginning at midnight local time, or beginning at a time consistent with a facility's operating schedule.

*Disposed offsite* means sending used organic HAP solvent or coatings outside of the facility boundaries for disposal.

*Emission* means the release or discharge, whether directly or indirectly, of HAP into the ambient air.

*Enamel* means a coat of colored material, usually opaque, that is applied as a protective topcoat over a basecoat, primer, or previously applied enamel coats. In some cases, another finishing material may be applied as a topcoat over the enamel.

*Equipment leak* means emissions of VHAP from pumps, valves, flanges, or other equipment used to transfer or apply coatings, adhesives, or organic HAP solvents.

*Equivalent method* means any method of sampling and analyzing for an air pollutant that has been demonstrated to the Administrator's satisfaction to have a consistent and quantitatively known relationship to the reference method, under specific conditions.

*Finishing material* means a coating used in the wood furniture industry. Such materials include, but are not limited to, stains, basecoats, washcoats, enamels, sealers, and topcoats.

*Finishing operation* means those operations in which a finishing material is applied to a substrate and is subsequently air-dried, cured in an oven, or cured by radiation.

*Foam adhesive* means a contact adhesive used for gluing foam to fabric, foam to foam, and fabric to wood.

*Gluing operation* means those operations in which adhesives are used to join components, for example, to apply a laminate to a wood substrate or foam to fabric.

*Incidental wood furniture manufacturer* means a major source that is primarily engaged in the manufacture of products other than wood furniture or wood furniture components and that uses no more than 100 gallons per month of finishing material or adhesives in the manufacture of wood furniture or wood furniture components.

*Incinerator* means, for the purposes of this industry, an enclosed combustion device that thermally oxidizes volatile organic compounds to CO and CO<sub>2</sub>. This term does not include devices that burn municipal or hazardous waste material.

*Janitorial maintenance* means the upkeep of equipment or building structures that is not directly related to the manufacturing process, for example, cleaning of restroom facilities.

*Lower confidence limit (LCL) approach* means a set of approval criteria that must be met so that data from an alternative test method can be used in determining the capture efficiency of a control system. For additional information, see *Guidelines for Determining Capture Efficiency*, January 1994. (Docket No. A-93-10, Item No. IV-B-1).

*Material safety data sheet (MSDS)* means the documentation required for hazardous chemicals by the Occupational Safety and Health Administration (OSHA) Hazard Communication Standard (29 CFR Part 1910) for a solvent, cleaning material, contact adhesive, coating, or other material that identifies select reportable hazardous ingredients of the material, safety and health considerations, and handling procedures.

*Noncompliant coating/contact adhesive* means a finishing material, contact adhesive, or strippable booth coating that has a VHAP content (VOC content for the strippable booth coating) greater than the emission limitation presented in Table 3 of this subpart.

*Nonporous substrate* means a surface that is impermeable to liquids. Examples include metal, rigid plastic, flexible vinyl, and rubber.

*Normally closed container* means a container that is closed unless an operator is actively engaged in activities such as emptying or filling the container.

*Operating parameter value* means a minimum or maximum value established for a control device or process parameter that, if achieved by itself or in combination with one or more other operating parameter values, determines that an owner or operator has complied with an applicable emission limit.

*Organic HAP solvent* means a HAP that is a volatile organic liquid used for dissolving or dispersing constituents in a coating or contact adhesive, adjusting the viscosity of a coating or contact adhesive, or cleaning equipment. When used in a coating or contact adhesive, the organic HAP solvent evaporates during drying and does not become a part of the dried film.

*Overall control efficiency* means the efficiency of a control system, calculated as the product of the capture and control device efficiencies, expressed as a percentage.

*Permanent total enclosure* means a permanently installed enclosure that completely surrounds a source of emissions such that all emissions are captured and contained for discharge through a control device. For additional information, see *Guidelines for Determining Capture Efficiency*, January 1994. (Docket No. A-93-10, Item No. IV-B-1).

*Recycled onsite* means the reuse of an organic HAP solvent in a process other than cleaning or washoff.

*Reference method* means any method of sampling and analyzing for an air pollutant that is published in Appendix A of 40 CFR part 60.

*Research or laboratory facility* means any stationary source whose primary purpose is to conduct research and development to develop new processes and products where such source is operated under the close supervision of technically trained personnel and is not engaged in the manufacture of products for commercial sale in commerce, except in a de minimis manner.

*Responsible official* has the meaning given to it in 40 CFR part 70, State Operating Permit Programs (Title V permits).

*Sealer* means a finishing material used to seal the pores of a wood substrate before additional coats of finishing material are applied. Special purpose finishing materials that are used in some finishing systems to optimize aesthetics are not sealers.

*Solvent* means a liquid used in a coating or contact adhesive to dissolve or disperse constituents and/or to adjust viscosity. It evaporates during drying and does not become a part of the dried film.

*Stain* means any color coat having a solids content by weight of no more than 8.0 percent that is applied in single or multiple coats directly to the substrate. It includes, but is not limited to, nongrain raising stains, equalizer stains, prestains, sap stains, body stains, no-wipe stains, penetrating stains, and toners.

*Storage containers* means vessels or tanks, including mix equipment, used to hold finishing, gluing, cleaning, or washoff materials.

*Strippable spray booth material* means a coating that:

- (1) Is applied to a spray booth wall to provide a protective film to receive over spray during finishing operations;
- (2) That is subsequently peeled off and disposed; and
- (3) By achieving (1) and (2) of this definition reduces or eliminates the need to use organic HAP solvents to clean spray booth walls.

*Substrate* means the surface onto which a coating or contact adhesive is applied (or into which a coating or contact adhesive is impregnated).

*Temporary total enclosure* means an enclosure that meets the requirements of §63.805(e)(1) (i) through (iv) and is not permanent, but constructed only to measure the capture efficiency of pollutants emitted from a given source. Additionally, any exhaust point from the enclosure shall be at least four equivalent duct or hood diameters from each natural draft opening. For additional information, see *Guidelines for Determining Capture Efficiency*, January 1994. (Docket No. A-93-10, Item No. IV-B-1).

*Thinner* means a volatile liquid that is used to dilute coatings or contact adhesives (to reduce viscosity, color strength, and solids, or to modify drying conditions).

*Topcoat* means the last film-building finishing material that is applied in a finishing system.

*Touchup and repair* means the application of finishing materials to cover minor finishing imperfections.

*VHAP* means any volatile hazardous air pollutant listed in Table 2 to Subpart JJ.

*VHAP of potential concern* means any VHAP from the list in table 6 of this subpart.

*Volatile organic compound (VOC)* means any organic compound which participates in atmospheric photochemical reactions, that is, any organic compound other than those which the Administrator designates as having negligible photochemical reactivity. A VOC may be measured by a reference method, an equivalent method, an alternative method, or by procedures specified under any rule. A reference method, an equivalent method, or an alternative method, however, may also measure nonreactive organic compounds. In such cases, the owner or operator may exclude the nonreactive organic compounds when determining compliance with a standard. For a list of compounds that the Administrator has designated as having negligible photochemical reactivity, refer to 40 CFR part 51.10.

*Washcoat* means a transparent special purpose finishing material having a solids content by weight of 12.0 percent by weight or less. Washcoats are applied over initial stains to protect, to control color, and to stiffen the wood fibers in order to aid sanding.

*Washoff operations* means those operations in which organic HAP solvent is used to remove coating from wood furniture or a wood furniture component.

*Wood furniture* means any product made of wood, a wood product such as rattan or wicker, or an engineered wood product such as particleboard that is manufactured under any of the following standard industrial classification codes: 2434, 2511, 2512, 2517, 2519, 2521, 2531, 2541, 2599, or 5712.

*Wood furniture component* means any part that is used in the manufacture of wood furniture. Examples include, but are not limited to, drawer sides, cabinet doors, seat cushions, and laminated tops. However, foam seat cushions manufactured and fabricated at a facility that does not engage in any other wood furniture or wood furniture component manufacturing operation are excluded from this definition.

*Wood furniture manufacturing operations* means the finishing, gluing, cleaning, and washoff operations associated with the production of wood furniture or wood furniture components.

(b) The nomenclature used in this subpart has the following meaning:

- (1)  $A_k$  = the area of each natural draft opening (k) in a total enclosure, in square meters.
- (2)  $C_c$  = the VHAP content of a finishing material (c), in kilograms of volatile hazardous air pollutants per kilogram of coating solids (kg VHAP/kg solids), as supplied. Also given in pounds of volatile hazardous air pollutants per pound of coating solids (lb VHAP/lb solids).
- (3)  $C_{aj}$  = the concentration of VHAP in gas stream (j) exiting the control device, in parts per million by volume.
- (4)  $C_{bi}$  = the concentration of VHAP in gas stream (i) entering the control device, in parts per million by volume.
- (5)  $C_{di}$  = the concentration of VHAP in gas stream (i) entering the control device from the affected source, in parts per million by volume.
- (6)  $C_{fk}$  = the concentration of VHAP in uncontrolled gas stream (k) emitted directly to the atmosphere from the affected source, in parts per million by volume.
- (7)  $E$  = the emission limit achieved by an emission point or a set of emission points, in kg VHAP/kg solids (lb VHAP/lb solids).
- (8)  $F$  = the control device efficiency, expressed as a fraction.
- (9)  $FV$  = the average inward face velocity across all natural draft openings in a total enclosure, in meters per hour.
- (10)  $G$  = the VHAP content of a contact adhesive, in kg VHAP/kg solids (lb VHAP/lb solids), as applied.
- (11)  $M$  = the mass of solids in finishing material used monthly, kg solids/month (lb solids/month).

- (12)  $N$ =the capture efficiency, expressed as a fraction.
- (13)  $Q_{aj}$ =the volumetric flow rate of gas stream (j) exiting the control device, in dry standard cubic meters per hour.
- (14)  $Q_{bi}$ =the volumetric flow rate of gas stream (i) entering the control device, in dry standard cubic meters per hour.
- (15)  $Q_{di}$ =the volumetric flow rate of gas stream (i) entering the control device from the emission point, in dry standard cubic meters per hour.
- (16)  $Q_{fk}$ =the volumetric flow rate of uncontrolled gas stream (k) emitted directly to the atmosphere from the emission point, in dry standard cubic meters per hour.
- (17)  $Q_{ini}$ =the volumetric flow rate of gas stream (i) entering the total enclosure through a forced makeup air duct, in standard cubic meters per hour (wet basis).
- (18)  $Q_{outj}$ =the volumetric flow rate of gas stream (j) exiting the total enclosure through an exhaust duct or hood, in standard cubic meters per hour (wet basis).
- (19)  $R$ =the overall efficiency of the control system, expressed as a percentage.
- (20)  $S$ =the VHAP content of a solvent, expressed as a weight fraction, added to finishing materials.
- (21)  $W$ =the amount of solvent, in kilograms (pounds), added to finishing materials during the monthly averaging period.
- (22)  $ac$ =after the control system is installed and operated.
- (23)  $bc$ =before control.

[60 FR 62936, Dec. 7, 1995, as amended at 62 FR 30260, June 3, 1997; 62 FR 31363, June 9, 1997; 63 FR 71380, Dec. 28, 1998]

### **§ 63.802 Emission limits.**

(a) Each owner or operator of an existing affected source subject to this subpart shall:

(1) Limit VHAP emissions from finishing operations by meeting the emission limitations for existing sources presented in Table 3 of this subpart, using any of the compliance methods in §63.804(a). To determine VHAP emissions from a finishing material containing formaldehyde or styrene, the owner or operator of the affected source shall use the methods presented in §63.803(l)(2) for determining styrene and formaldehyde usage.

(2) Limit VHAP emissions from contact adhesives by achieving a VHAP limit for contact adhesives based on the following criteria:

(i) For foam adhesives (contact adhesives used for upholstery operations) used in products that meet the upholstered seating flammability requirements of California Technical Bulletin 116, 117, or 133, the Business and Institutional Furniture Manufacturers Association's (BIFMA's) X5.7, UFAC flammability testing, or any similar requirements from local, State, or Federal fire regulatory agencies, the VHAP content of the adhesive shall not exceed 1.8 kg VHAP/kg solids (1.8 lb VHAP/lb solids), as applied; or

(ii) For all other contact adhesives (including foam adhesives used in products that do not meet the standards presented in paragraph (a)(2)(i) of this section, but excluding aerosol adhesives and excluding contact adhesives applied to nonporous substrates, the VHAP content of the adhesive shall not exceed 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids), as applied.

(3) Limit HAP emissions from strippable spray booth coatings by using coatings that contain no more than 0.8 kg VOC/kg solids (0.8 lb VOC/lb solids), as applied.

(b) Each owner or operator of a new affected source subject to this subpart shall:

(1) Limit VHAP emissions from finishing operations by meeting the emission limitations for new sources presented in Table 3 of this subpart using any of the compliance methods in §63.804(d). To determine VHAP emissions from a finishing material containing formaldehyde or styrene, the owner or operator of the affected source shall use the methods presented in §63.803(l)(2) for determining styrene and formaldehyde usage.

(2) Limit VHAP emissions from contact adhesives by achieving a VHAP limit for contact adhesives, excluding aerosol adhesives and excluding contact adhesives applied to nonporous substrates, of no greater than 0.2 kg VHAP/kg solids (0.2 lb VHAP/lb solids), as applied, using either of the compliance methods in §63.804(e).

(3) Limit HAP emissions from strippable spray booth coatings by using coatings that contain no more than 0.8 kg VOC/kg solids (0.8 lb VOC/lb solids), as applied.

### **§ 63.803 Work practice standards.**

(a) *Work practice implementation plan.* (1) Each owner or operator of an affected source subject to this subpart shall prepare and maintain a written work practice implementation plan that defines environmentally desirable work practices for each wood furniture operation manufacturing operation and addresses each of the work practice standards presented in paragraphs (b) through (l) of this section. The plan shall be developed no more than 60 days after the compliance date.

(2) The written work practice implementation plan shall be available for inspection by the Administrator (or delegated State, local, or Tribal authority) upon request. If the Administrator (or delegated State, local, or Tribal authority) determines that the work practice implementation plan does not include sufficient mechanisms for ensuring that the work practice standards are being implemented, the Administrator (or delegated State, local, or Tribal authority) may require the affected source to modify the plan. Revisions or modifications to the plan do not require a revision of the source's Title V permit.

(3) The inspection and maintenance plan required by paragraph (c) of this section and the formulation assessment plan for finishing operations required by paragraph (l) of this section are also reviewable by the Administrator (or delegated State, local, or Tribal authority).

(b) *Operator training course.* Each owner or operator of an affected source shall train all new and existing personnel, including contract personnel, who are involved in finishing, gluing, cleaning, and washoff operations, use of manufacturing equipment, or implementation of the requirements of this subpart. All new personnel, those hired after the compliance date of the standard, shall be trained upon hiring. All existing personnel, those hired before the compliance date of the standard, shall be trained within six months of the compliance date of the standard. All personnel shall be given refresher training annually. The affected source shall maintain a copy of the training program with the work practice implementation plan. The training program shall include, at a minimum, the following:

(1) A list of all current personnel by name and job description that are required to be trained;

(2) An outline of the subjects to be covered in the initial and refresher training for each position or group of personnel;

(3) Lesson plans for courses to be given at the initial and the annual refresher training that include, at a minimum, appropriate application techniques, appropriate cleaning and washoff procedures, appropriate equipment setup and adjustment to minimize finishing material usage and overspray, and appropriate management of cleanup wastes; and

(4) A description of the methods to be used at the completion of initial or refresher training to demonstrate and document successful completion.

(c) *Inspection and maintenance plan.* Each owner or operator of an affected source shall prepare and maintain with the work practice implementation plan a written leak inspection and maintenance plan that specifies:

- (1) A minimum visual inspection frequency of once per month for all equipment used to transfer or apply coatings, adhesives, or organic HAP solvents;
- (2) An inspection schedule;
- (3) Methods for documenting the date and results of each inspection and any repairs that were made;
- (4) The timeframe between identifying the leak and making the repair, which adheres, at a minimum, to the following schedule:
  - (i) A first attempt at repair (e.g., tightening of packing glands) shall be made no later than five calendar days after the leak is detected; and
  - (ii) Final repairs shall be made within 15 calendar days after the leak is detected, unless the leaking equipment is to be replaced by a new purchase, in which case repairs shall be completed within three months.
- (d) *Cleaning and washoff solvent accounting system.* Each owner or operator of an affected source shall develop an organic HAP solvent accounting form to record:
  - (1) The quantity and type of organic HAP solvent used each month for washoff and cleaning, as defined in §63.801 of this subpart;
  - (2) The number of pieces washed off, and the reason for the washoff; and
  - (3) The quantity of spent organic HAP solvent generated from each washoff and cleaning operation each month, and whether it is recycled onsite or disposed offsite.
- (e) *Chemical composition of cleaning and washoff solvents.* Each owner or operator of an affected source shall not use cleaning or washoff solvents that contain any of the pollutants listed in Table 4 to this subpart, in concentrations subject to MSDS reporting as required by OSHA.
- (f) *Spray booth cleaning.* Each owner or operator of an affected source shall not use compounds containing more than 8.0 percent by weight of VOC for cleaning spray booth components other than conveyors, continuous coaters and their enclosures, or metal filters, or plastic filters unless the spray booth is being refurbished. If the spray booth is being refurbished, that is the spray booth coating or other protective material used to cover the booth is being replaced, the affected source shall use no more than 1.0 gallon of organic HAP solvent per booth to prepare the surface of the booth prior to applying the booth coating.
- (g) *Storage requirements.* Each owner or operator of an affected source shall use normally closed containers for storing finishing, gluing, cleaning, and washoff materials.
- (h) *Application equipment requirements.* Each owner or operator of an affected source shall use conventional air spray guns to apply finishing materials only under any of the following circumstances:
  - (1) To apply finishing materials that have a VOC content no greater than 1.0 lb VOC/lb solids, as applied;
  - (2) For touchup and repair under the following conditions:
    - (i) The touchup and repair occurs after completion of the finishing operation; or
    - (ii) The touchup and repair occurs after the application of stain and before the application of any other type of finishing material, and the materials used for touchup and repair are applied from a container that has a volume of no more than 2.0 gallons.
  - (3) When spray is automated, that is, the spray gun is aimed and triggered automatically, not manually;

- (4) When emissions from the finishing application station are directed to a control device;
- (5) The conventional air gun is used to apply finishing materials and the cumulative total usage of that finishing material is no more than 5.0 percent of the total gallons of finishing material used during that semiannual period; or
- (6) The conventional air gun is used to apply stain on a part for which it is technically or economically infeasible to use any other spray application technology.

The affected source shall demonstrate technical or economic infeasibility by submitting to the Administrator a videotape, a technical report, or other documentation that supports the affected source's claim of technical or economic infeasibility. The following criteria shall be used, either independently or in combination, to support the affected source's claim of technical or economic infeasibility:

- (i) The production speed is too high or the part shape is too complex for one operator to coat the part and the application station is not large enough to accommodate an additional operator; or
  - (ii) The excessively large vertical spray area of the part makes it difficult to avoid sagging or runs in the stain.
- (i) *Line cleaning.* Each owner or operator of an affected source shall pump or drain all organic HAP solvent used for line cleaning into a normally closed container.
- (j) *Gun cleaning.* Each owner or operator of an affected source shall collect all organic HAP solvent used to clean spray guns into a normally closed container.
- (k) *Washoff operations.* Each owner or operator of an affected source shall control emissions from washoff operations by:
- (1) Using normally closed tanks for washoff; and
  - (2) Minimizing dripping by tilting or rotating the part to drain as much solvent as possible.
- (l) *Formulation assessment plan for finishing operations.* Each owner or operator of an affected source shall prepare and maintain with the work practice implementation plan a formulation assessment plan that:
- (1) Identifies VHAP from the list presented in Table 5 of this subpart that are being used in finishing operations by the affected source;
  - (2) Establishes a baseline level of usage by the affected source, for each VHAP identified in paragraph (l)(1) of this section. The baseline usage level shall be the highest annual usage from 1994, 1995, or 1996, for each VHAP identified in paragraph (l)(1) of this section. For formaldehyde, the baseline level of usage shall be based on the amount of free formaldehyde present in the finishing material when it is applied. For styrene, the baseline level of usage shall be an estimate of unreacted styrene, which shall be calculated by multiplying the amount of styrene monomer in the finishing material, when it is applied, by a factor of 0.16. Sources using a control device to reduce emissions may adjust their usage based on the overall control efficiency of the control system, which is determined using the equation in §63.805 (d) or (e).
  - (3) Tracks the annual usage of each VHAP identified in (l)(1) by the affected source that is present in amounts subject to MSDS reporting as required by OSHA.
  - (4) If, after November 1998, the annual usage of the VHAP identified in paragraph (l)(1) exceeds its baseline level, then the owner or operator of the affected source shall provide a written notification to the permitting authority that describes the amount of the increase and explains the reasons for exceedance of the baseline level. The following explanations would relieve the owner or operator from further action, unless the affected source is not in compliance with any State regulations or requirements for that VHAP:
    - (i) The exceedance is no more than 15.0 percent above the baseline level;

(ii) Usage of the VHAP is below the *de minimis* level presented in Table 5 of this subpart for that VHAP (sources using a control device to reduce emissions may adjust their usage based on the overall control efficiency of the control system, which is determined using the procedures in §63.805 (d) or (e);

(iii) The affected source is in compliance with its State's air toxic regulations or guidelines for the VHAP; or

(iv) The source of the pollutant is a finishing material with a VOC content of no more than 1.0 kg VOC/kg solids (1.0 lb VOC/lb solids), as applied.

(5) If none of the above explanations are the reason for the increase, the owner or operator shall confer with the permitting authority to discuss the reason for the increase and whether there are practical and reasonable technology-based solutions for reducing the usage. The evaluation of whether a technology is reasonable and practical shall be based on cost, quality, and marketability of the product, whether the technology is being used successfully by other wood furniture manufacturing operations, or other criteria mutually agreed upon by the permitting authority and owner or operator. If there are no practical and reasonable solutions, the facility need take no further action. If there are solutions, the owner or operator shall develop a plan to reduce usage of the pollutant to the extent feasible. The plan shall address the approach to be used to reduce emissions, a timetable for implementing the plan, and a schedule for submitting notification of progress.

(6) If, after November 1998, an affected source uses a VHAP of potential concern listed in table 6 of this subpart for which a baseline level has not been previously established, then the baseline level shall be established as the *de minimis* level provided in that same table for that chemical. The affected source shall track the annual usage of each VHAP of potential concern identified in this paragraph that is present in amounts subject to MSDS reporting as required by OSHA. If usage of the VHAP of potential concern exceeds the *de minimis* level listed in table 6 of this subpart for that chemical, then the affected source shall provide an explanation to the permitting authority that documents the reason for the exceedance of the *de minimis* level. If the explanation is not one of those listed in paragraphs (l)(4)(i) through (l)(4)(iv) of this section, the affected source shall follow the procedures in paragraph (l)(5) of this section.

[60 FR 62936, Dec. 7, 1995, as amended at 63 FR 71380, Dec. 28, 1998; 68 FR 37353, June 23, 2003]

### **§ 63.804 Compliance procedures and monitoring requirements.**

(a) The owner or operator of an existing affected source subject to §63.802(a)(1) shall comply with those provisions using any of the methods presented in §63.804 (a)(1) through (a)(4).

(1) Calculate the average VHAP content for all finishing materials used at the facility using Equation 1, and maintain a value of E no greater than 1.0;

$$E = (M_{c1}C_{c1} + M_{c2}C_{c2} + \dots + M_{cn}C_{cn} + S_1W_1 + S_2W_2 + \dots + S_nW_n) / (M_{c1} + M_{c2} + \dots + M_{cn}) \quad \text{Equation 1}$$

(2) Use compliant finishing materials according to the following criteria:

(i) Demonstrate that each stain, sealer, and topcoat has a VHAP content of no more than 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids), as applied, and each thinner contains no more than 10.0 percent VHAP by weight by maintaining certified product data sheets for each coating and thinner;

(ii) Demonstrate that each washcoat, basecoat, and enamel that is purchased pre-made, that is, it is not formulated onsite by thinning another finishing material, has a VHAP content of no more than 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids), as applied, and each thinner contains no more than 10.0 percent VHAP by weight by maintaining certified product data sheets for each coating and thinner; and

(iii) Demonstrate that each washcoat, basecoat, and enamel that is formulated at the affected source is formulated using a finishing material containing no more than 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids) and a thinner containing no more than 3.0 percent VHAP by weight.

(3) Use a control system with an overall control efficiency (R) such that the value of  $E_{ac}$  in Equation 2 is no greater than 1.0.

$$R = [(E_{bc} - E_{ac}) / E_{bc}] (100) \quad \text{Equation 2}$$

The value of  $E_{bc}$  in Equation 2 shall be calculated using Equation 1; or

(4) Use any combination of an averaging approach, as described in paragraph (a)(1) of this section, compliant finishing materials, as described in paragraph (a)(2) of this section, and a control system, as described in paragraph (a)(3) of this section.

(b) The owner or operator of an affected source subject to §63.802(a)(2)(i) shall comply with the provisions by using compliant foam adhesives with a VHAP content no greater than 1.8 kg VHAP/kg solids (1.8 lb VHAP/lb solids), as applied.

(c) The owner or operator of an affected source subject to §63.802(a)(2)(ii) shall comply with those provisions by using either of the methods presented in §63.804 (c)(1) and (c)(2).

(1) Use compliant contact adhesives with a VHAP content no greater than 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids), as applied; or

(2) Use a control system with an overall control efficiency (R) such that the value of  $G_{ac}$  is no greater than 1.0.

$$R = [(G_{bc} - G_{ac}) / G_{bc}] (100) \quad \text{Equation 3}$$

(d) The owner or operator of a new affected source subject to §63.802(b)(1) may comply with those provisions by using any of the following methods:

(1) Calculate the average VHAP content across all finishing materials used at the facility using Equation 1, and maintain a value of E no greater than 0.8;

(2) Use compliant finishing materials according to the following criteria:

(i) Demonstrate that each sealer and topcoat has a VHAP content of no more than 0.8 kg VHAP/kg solids (0.8 lb VHAP/lb solids), as applied, each stain has a VHAP content of no more than 1.0 kg VHAP/kg solids (1.0 lb VHAP/lb solids), as applied, and each thinner contains no more than 10.0 percent VHAP by weight;

(ii) Demonstrate that each washcoat, basecoat, and enamel that is purchased pre-made, that is, it is not formulated onsite by thinning another finishing material, has a VHAP content of no more than 0.8 kg VHAP/kg solids (0.8 lb VHAP/lb solids), as applied, and each thinner contains no more than 10.0 percent VHAP by weight; and

(iii) Demonstrate that each washcoat, basecoat, and enamel that is formulated onsite is formulated using a finishing material containing no more than 0.8 kg VHAP/kg solids (0.8 lb VHAP/lb solids) and a thinner containing no more than 3.0 percent HAP by weight.

(3) Use a control system with an overall control efficiency (R) such that the value of  $E_{ac}$  in Equation 4 is no greater than 0.8.

$$R = [(E_{bc} - E_{ac}) / E_{bc}] (100) \quad \text{Equation 4}$$

The value of  $E_{bc}$  in Equation 4 shall be calculated using Equation 1; or

(4) Use any combination of an averaging approach, as described in (d)(1), compliant finishing materials, as described in (d)(2), and a control system, as described in (d)(3).

(e) The owner or operator of a new affected source subject to §63.802(b)(2) shall comply with the provisions using either of the following methods:

(1) Use compliant contact adhesives with a VHAP content no greater than 0.2 kg VHAP/kg solids (0.2 lb VHAP/lb solids), as applied; or

(2) Use a control system with an overall control efficiency (R) such that the value of  $G_{ac}$  in Equation 3 is no greater than 0.2.

(f) *Initial compliance.* (1) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(1) or (d)(1) shall submit the results of the averaging calculation (Equation 1) for the first month with the initial compliance status report required by §63.807(b). The first month's calculation shall include data for the entire month in which the compliance date falls. For example, if the source's compliance date is November 21, 1997, the averaging calculation shall include data from November 1, 1997 to November 30, 1997.

(2) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(2) or (d)(2) shall submit an initial compliance status report, as required by §63.807(b), stating that compliant stains, washcoats, sealers, topcoats, basecoats, enamels, and thinners, as applicable, are being used by the affected source.

(3) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that are complying through the procedures established in §63.804 (a)(2) or (d)(2) and are applying coatings using continuous coaters shall demonstrate initial compliance by:

(i) Submitting an initial compliance status report, as required by §63.807(b), stating that compliant coatings, as determined by the VHAP content of the coating in the reservoir and the VHAP content as calculated from records, and compliant thinners are being used; or

(ii) Submitting an initial compliance status report, as required by §63.807(b), stating that compliant coatings, as determined by the VHAP content of the coating in the reservoir, are being used; the viscosity of the coating in the reservoir is being monitored; and compliant thinners are being used. The affected source shall also submit data that demonstrate that viscosity is an appropriate parameter for demonstrating compliance.

(4) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(3) or (d)(3) shall demonstrate initial compliance by:

(i) Submitting a monitoring plan that identifies each operating parameter to be monitored for the capture device and discusses why each parameter is appropriate for demonstrating continuous compliance;

(ii) Conducting an initial performance test as required under §63.7 using the procedures and test methods listed in §63.7 and §63.805 (c) and (d) or (e);

(iii) Calculating the overall control efficiency (R) following the procedures in §63.805 (d) or (e); and

(iv) Determining those operating conditions critical to determining compliance and establishing one or more operating parameters that will ensure compliance with the standard.

(A) For compliance with a thermal incinerator, minimum combustion temperature shall be the operating parameter.

(B) For compliance with a catalytic incinerator equipped with a fixed catalyst bed, the minimum gas temperature both upstream and downstream of the catalyst bed shall be the operating parameter.

(C) For compliance with a catalytic incinerator equipped with a fluidized catalyst bed, the minimum gas temperature upstream of the catalyst bed and the pressure drop across the catalyst bed shall be the operating parameters.

(D) For compliance with a carbon adsorber, the operating parameters shall be the total regeneration mass stream flow for each regeneration cycle and the carbon bed temperature after each regeneration, or the concentration level of organic compounds exiting the adsorber, unless the owner or operator requests and receives approval from the Administrator to establish other operating parameters.

(E) For compliance with a control device not listed in this section, one or more operating parameter values shall be established using the procedures identified in §63.804(g)(4)(vi).

(v) Owners or operators complying with §63.804(f)(4) shall calculate each site-specific operating parameter value as the arithmetic average of the maximum or minimum operating parameter values, as appropriate, that demonstrate compliance with the standards, during the three test runs required by §63.805(c)(1).

(5) Owners or operators of an affected source subject to the provisions of §63.802 (a)(2) or (b)(2) that comply through the procedures established in §63.804 (b), (c)(1), or (e)(1), shall submit an initial compliance status report, as required by §63.807(b), stating that compliant contact adhesives are being used by the affected source.

(6) Owners or operators of an affected source subject to the provisions of §63.802 (a)(2)(ii) or (b)(2) that comply through the procedures established in §63.804 (c)(2) or (e)(2), shall demonstrate initial compliance by:

(i) Submitting a monitoring plan that identifies each operating parameter to be monitored for the capture device and discusses why each parameter is appropriate for demonstrating continuous compliance;

(ii) Conducting an initial performance test as required under §63.7 using the procedures and test methods listed in §63.7 and §63.805 (c) and (d) or (e);

(iii) Calculating the overall control efficiency (R) following the procedures in §63.805 (d) or (e); and

(iv) Determining those operating conditions critical to determining compliance and establishing one or more operating parameters that will ensure compliance with the standard.

(A) For compliance with a thermal incinerator, minimum combustion temperature shall be the operating parameter.

(B) For compliance with a catalytic incinerator equipped with a fixed catalyst bed, the minimum gas temperature both upstream and downstream of the catalyst shall be the operating parameter.

(C) For compliance with a catalytic incinerator equipped with a fluidized catalyst bed, the minimum gas temperature upstream of the catalyst bed and the pressure drop across the catalyst bed shall be the operating parameters.

(v) Owners or operators complying with §63.804(f)(6) shall calculate each site-specific operating parameter value as the arithmetic average of the maximum or minimum operating values as appropriate, that demonstrate compliance with the standards, during the three test runs required by §63.805(c)(1).

(7) Owners or operators of an affected source subject to the provisions of §63.802 (a)(3) or (b)(3) shall submit an initial compliance status report, as required by §63.807(b), stating that compliant strippable spray booth coatings are being used by the affected source.

(8) Owners or operators of an affected source subject to the work practice standards in §63.803 shall submit an initial compliance status report, as required by §63.807(b), stating that the work practice implementation plan has been developed and procedures have been established for implementing the provisions of the plan.

(g) *Continuous compliance demonstrations.* (1) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(1) or (d)(1) shall demonstrate continuous compliance by submitting the results of the averaging calculation (Equation 1) for each month within that semiannual period and submitting a compliance certification with the semiannual report required by §63.807(c).

(i) The compliance certification shall state that the value of (E), as calculated by Equation 1, is no greater than 1.0 for existing sources or 0.8 for new sources. An affected source is in violation of the standard if E is greater than 1.0 for

existing sources or 0.8 for new sources for any month. A violation of the monthly average is a separate violation of the standard for each day of operation during the month, unless the affected source can demonstrate through records that the violation of the monthly average can be attributed to a particular day or days during the period.

(ii) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(2) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(2) or (d)(2) shall demonstrate continuous compliance by using compliant coatings and thinners, maintaining records that demonstrate the coatings and thinners are compliant, and submitting a compliance certification with the semiannual report required by §63.807(c).

(i) The compliance certification shall state that compliant stains, washcoats, sealers, topcoats, basecoats, enamels, and thinners, as applicable, have been used each day in the semiannual reporting period or should otherwise identify the periods of noncompliance and the reasons for noncompliance. An affected source is in violation of the standard whenever a noncompliant coating, as demonstrated by records or by a sample of the coating, is used.

(ii) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(3) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that are complying through the procedures established in §63.804 (a)(2) or (d)(2) and are applying coatings using continuous coaters shall demonstrate continuous compliance by following the procedures in paragraph (g)(3) (i) or (ii) of this section.

(i) Using compliant coatings, as determined by the VHAP content of the coating in the reservoir and the VHAP content as calculated from records, using compliant thinners, and submitting a compliance certification with the semiannual report required by §63.807(c).

(A) The compliance certification shall state that compliant coatings have been used each day in the semiannual reporting period, or should otherwise identify the days of noncompliance and the reasons for noncompliance. An affected source is in violation of the standard whenever a noncompliant coating, as determined by records or by a sample of the coating, is used. Use of a noncompliant coating is a separate violation for each day the noncompliant coating is used.

(B) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(ii) Using compliant coatings, as determined by the VHAP content of the coating in the reservoir, using compliant thinners, maintaining a viscosity of the coating in the reservoir that is no less than the viscosity of the initial coating by monitoring the viscosity with a viscosity meter or by testing the viscosity of the initial coating and retesting the coating in the reservoir each time solvent is added, maintaining records of solvent additions, and submitting a compliance certification with the semiannual report required by §63.807(c).

(A) The compliance certification shall state that compliant coatings, as determined by the VHAP content of the coating in the reservoir, have been used each day in the semiannual reporting period. Additionally, the certification shall state that the viscosity of the coating in the reservoir has not been less than the viscosity of the initial coating, that is, the coating that is initially mixed and placed in the reservoir, for any day in the semiannual reporting period.

(B) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(C) An affected source is in violation of the standard when a sample of the as-applied coating exceeds the applicable limit established in §63.804 (a)(2) or (d)(2), as determined using EPA Method 311, or the viscosity of the coating in the reservoir is less than the viscosity of the initial coating.

(4) Owners or operators of an affected source subject to the provisions of §63.802 (a)(1) or (b)(1) that comply through the procedures established in §63.804 (a)(3) or (d)(3) shall demonstrate continuous compliance by installing, calibrating, maintaining, and operating the appropriate monitoring equipment according to manufacturer's

specifications. The owner or operator shall also submit the excess emissions and continuous monitoring system performance report and summary report required by §63.807(d) and §63.10(e) of subpart A.

(i) Where a capture/control device is used, a device to monitor each site-specific operating parameter established in accordance with §63.804(f)(6)(i) is required.

(ii) Where an incinerator is used, a temperature monitoring device equipped with a continuous recorder is required.

(A) Where a thermal incinerator is used, a temperature monitoring device shall be installed in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.

(B) Where a catalytic incinerator equipped with a fixed catalyst bed is used, temperature monitoring devices shall be installed in the gas stream immediately before and after the catalyst bed.

(C) Where a catalytic incinerator equipped with a fluidized catalyst bed is used, a temperature monitoring device shall be installed in the gas stream immediately before the bed. In addition, a pressure monitoring device shall be installed to determine the pressure drop across the catalyst bed. The pressure drop shall be measured monthly at a constant flow rate.

(iii) Where a carbon adsorber is used one of the following is required:

(A) An integrating stream flow monitoring device having an accuracy of  $\pm 10$  percent, capable of recording the total regeneration stream mass flow for each regeneration cycle; and a carbon bed temperature monitoring device, having an accuracy of  $\pm 1$  percent of the temperature being monitored or  $\pm 0.5$  °C, whichever is greater, and capable of recording the carbon bed temperature after each regeneration and within 15 minutes of completing any cooling cycle;

(B) An organic monitoring device, equipped with a continuous recorder, to indicate the concentration level of organic compounds exiting the carbon adsorber; or

(C) Any other monitoring device that has been approved by the Administrator in accordance with §63.804(f)(4)(iv)(D).

(iv) Owners or operators of an affected source shall not operate the capture or control device at a daily average value greater than or less than (as appropriate) the operating parameter values. The daily average value shall be calculated as the average of all values for a monitored parameter recorded during the operating day.

(v) Owners or operators of an affected source that are complying through the use of a catalytic incinerator equipped with a fluidized catalyst bed shall maintain a constant pressure drop, measured monthly, across the catalyst bed.

(vi) An owner or operator who uses a control device not listed in §63.804(f)(4) shall submit, for the Administrator's approval, a description of the device, test data verifying performance, and appropriate site-specific operating parameters that will be monitored to demonstrate continuous compliance with the standard.

(5) Owners or operators of an affected source subject to the provisions of §63.802 (a)(2) (i) or (ii) or (b)(2) that comply through the procedures established in §63.804 (b), (c)(1), or (e)(1), shall submit a compliance certification with the semiannual report required by §63.807(c).

(i) The compliance certification shall state that compliant contact and/or foam adhesives have been used each day in the semiannual reporting period, or should otherwise identify each day noncompliant contact and/or foam adhesives were used. Each day a noncompliant contact or foam adhesive is used is a single violation of the standard.

(ii) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(6) Owners or operators of an affected source subject to the provisions of §63.802 (a)(2)(ii) or (b)(2) that comply through the procedures established in §63.804 (c)(2) or (e)(2), shall demonstrate continuous compliance by installing, calibrating, maintaining, and operating the appropriate monitoring equipment according to the manufacturer's

specifications. The owner or operator shall also submit the excess emissions and continuous monitoring system performance report and summary report required by §63.807(d) and §63.10(e) of subpart A of this part.

(i) Where a capture/control device is used, a device to monitor each site-specific operating parameter established in accordance with §63.804(f)(6)(i) is required.

(ii) Where an incinerator is used, a temperature monitoring device equipped with a continuous recorder is required.

(A) Where a thermal incinerator is used, a temperature monitoring device shall be installed in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.

(B) Where a catalytic incinerator equipped with a fixed catalyst bed is used, temperature monitoring devices shall be installed in the gas stream immediately before and after the catalyst bed.

(C) Where a catalytic incinerator equipped with a fluidized catalyst bed is used, a temperature monitoring device shall be installed in the gas stream immediately before the bed. In addition, a pressure monitoring device shall be installed to measure the pressure drop across the catalyst bed. The pressure drop shall be measured monthly at a constant flow rate.

(iii) Where a carbon adsorber is used one of the following is required:

(A) An integrating stream flow monitoring device having an accuracy of  $\pm 10$  percent, capable of recording the total regeneration stream mass flow for each regeneration cycle; and a carbon bed temperature monitoring device, having an accuracy of  $\pm 1$  percent of the temperature being monitored or  $\pm 0.5$  °C, whichever is greater, and capable of recording the carbon bed temperature after each regeneration and within 15 minutes of completing any cooling cycle;

(B) An organic monitoring device, equipped with a continuous recorder, to indicate the concentration level of organic compounds exiting the carbon adsorber; or

(C) Any other monitoring device that has been approved by the Administrator in accordance with §63.804(f)(4)(iv)(D).

(iv) Owners or operators of an affected source shall not operate the capture or control device at a daily average value greater than or less than (as appropriate) the operating parameter values. The daily average value shall be calculated as the average of all values for a monitored parameter recorded during the operating day.

(v) Owners or operators of an affected source that are complying through the use of a catalytic incinerator equipped with a fluidized catalyst bed shall maintain a constant pressure drop, measured monthly, across the catalyst bed.

(vi) An owner or operator using a control device not listed in this section shall submit to the Administrator a description of the device, test data verifying the performance of the device, and appropriate operating parameter values that will be monitored to demonstrate continuous compliance with the standard. Compliance using this device is subject to the Administrator's approval.

(7) Owners or operators of an affected source subject to the provisions of §63.802 (a)(3) or (b)(3) shall submit a compliance certification with the semiannual report required by §63.807(c).

(i) The compliance certification shall state that compliant strippable spray booth coatings have been used each day in the semiannual reporting period, or should otherwise identify each day noncompliant materials were used. Each day a noncompliant strippable booth coating is used is a single violation of the standard.

(ii) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

(8) Owners or operators of an affected source subject to the work practice standards in §63.803 shall submit a compliance certification with the semiannual report required by §63.807(c).

(i) The compliance certification shall state that the work practice implementation plan is being followed, or should otherwise identify the provisions of the plan that have not been implemented and each day the provisions were not implemented. During any period of time that an owner or operator is required to implement the provisions of the plan, each failure to implement an obligation under the plan during any particular day is a violation.

(ii) The compliance certification shall be signed by a responsible official of the company that owns or operates the affected source.

### **§ 63.805 Performance test methods.**

(a) The EPA Method 311 of appendix A of part 63 shall be used in conjunction with formulation data to determine the VHAP content of the liquid coating. Formulation data shall be used to identify VHAP present in the coating. The EPA Method 311 shall then be used to quantify those VHAP identified through formulation data. The EPA Method 311 shall not be used to quantify HAP such as styrene and formaldehyde that are emitted during the cure. The EPA Method 24 (40 CFR part 60, appendix A) shall be used to determine the solids content by weight and the density of coatings. If it is demonstrated to the satisfaction of the Administrator that a coating does not release VOC or HAP byproducts during the cure, for example, all VOC and HAP present in the coating is solvent, then batch formulation information shall be accepted. The owner or operator of an affected source may request approval from the Administrator to use an alternative method for determining the VHAP content of the coating. In the event of any inconsistency between the EPA Method 24 or Method 311 test data and a facility's formulation data, that is, if the EPA Method 24/311 value is higher, the EPA Method 24/311 test shall govern unless after consultation, a regulated source could demonstrate to the satisfaction of the enforcement agency that the formulation data were correct. Sampling procedures shall follow the guidelines presented in "Standard Procedures for Collection of Coating and Ink Samples for VOC Content Analysis by Reference Method 24 and Reference Method 24A," EPA-340/1-91-010. (Docket No. A-93-10, Item No. IV-A-1).

(b) Owners or operators demonstrating compliance in accordance with §63.804 (f)(4) or (f)(6) and §63.804 (g)(4) or (g)(6), or complying with any of the other emission limits of §63.802 by operating a capture or control device shall determine the overall control efficiency of the control system (R) as the product of the capture and control device efficiency, using the test methods cited in §63.805(c) and the procedures in §63.805 (d) or (e).

(c) When an initial compliance demonstration is required by §63.804 (f)(4) or (f)(6) of this subpart, the procedures in paragraphs (c)(1) through (c)(6) of this section shall be used in determining initial compliance with the provisions of this subpart.

(1) The EPA Method 18 (40 CFR part 60, appendix A) shall be used to determine the HAP concentration of gaseous air streams. The test shall consist of three separate runs, each lasting a minimum of 30 minutes.

(2) The EPA Method 1 or 1A (40 CFR part 60, appendix A) shall be used for sample and velocity traverses.

(3) The EPA Method 2, 2A, 2C, or 2D (40 CFR part 60, appendix A) shall be used to measure velocity and volumetric flow rates.

(4) The EPA Method 3 (40 CFR part 60, appendix A) shall be used to analyze the exhaust gases.

(5) The EPA Method 4 (40 CFR part 60, appendix A) shall be used to measure the moisture in the stack gas.

(6) The EPA Methods 2, 2A, 2C, 2D, 3, and 4 shall be performed, as applicable, at least twice during each test period.

(d) Each owner or operator of an affected source demonstrating compliance in accordance with §63.804 (f)(4) or (f)(6) shall perform a gaseous emission test using the following procedures:

(1) Construct the overall HAP emission reduction system so that all volumetric flow rates and total HAP emissions can be accurately determined by the applicable test methods specified in §63.805(c) (1) through (6);

(2) Determine capture efficiency from the affected emission point(s) by capturing, venting, and measuring all HAP emissions from the affected emission point(s). During a performance test, the owner or operator shall isolate affected emission point(s) located in an area with other nonaffected gaseous emission sources from all other gaseous emission point(s) by any of the following methods:

(i) Build a temporary total enclosure (see §63.801) around the affected emission point(s); or

(ii) Use the building that houses the process as the enclosure (see §63.801);

(iii) Use any alternative protocol and test method provided they meet either the requirements of the data quality objective (DQO) approach or the lower confidence level (LCL) approach (see §63.801);

(iv) Shut down all nonaffected HAP emission point(s) and continue to exhaust fugitive emissions from the affected emission point(s) through any building ventilation system and other room exhausts such as drying ovens. All exhaust air must be vented through stacks suitable for testing; or

(v) Use another methodology approved by the Administrator provided it complies with the EPA criteria for acceptance under part 63, appendix A, Method 301.

(3) Operate the control device with all affected emission points that will subsequently be delivered to the control device connected and operating at maximum production rate;

(4) Determine the efficiency (F) of the control device using the following equation:

$$F = \frac{\sum_{i=1}^n Q_{di} C_{di} - \sum_{j=1}^p Q_{aj} C_{aj}}{\sum_{i=1}^n Q_{di} C_{di}} \quad (\text{Equation 5})$$

(5) Determine the efficiency (N) of the capture system using the following equation:

$$N = \frac{\sum_{i=1}^n Q_{di} C_{di}}{\sum_{i=1}^n Q_{di} C_{di} + \sum_{k=1}^p Q_{jk} C_{jk}} \quad (\text{Equation 6})$$

(6) For each affected source complying with §63.802(a)(1) in accordance with §63.804(a)(3), compliance is demonstrated if the product of (F×N)(100) yields a value (R) such that the value of  $E_{ac}$  in Equation 2 is no greater than 1.0.

(7) For each new affected source complying with §63.802(b)(1) in accordance with §63.804(d)(3), compliance is demonstrated if the product of (F×N)(100) yields a value (R) such that the value of  $E_{ac}$  in Equation 4 is no greater than 0.8.

(8) For each affected source complying with §63.802(a)(2)(ii) in accordance with §63.804(c)(2), compliance is demonstrated if the product of (F×N)(100) yields a value (R) such that the value of  $G_{ac}$  in Equation 3 is no greater than 1.0.

(9) For each new affected source complying with §63.802(b)(2) in accordance with §63.804(e)(2), compliance is demonstrated if the product of (F×N)(100) yields a value (R) such that the value of  $G_{ac}$  in Equation 3 is no greater than 0.2.

(e) An alternative method to the compliance method in §63.805(d) is the installation of a permanent total enclosure around the affected emission point(s). A permanent total enclosure presents prima facie evidence that all HAP emissions from the affected emission point(s) are directed to the control device. Each affected source that complies using a permanent total enclosure shall:

(1) Demonstrate that the total enclosure meets the requirements in paragraphs (e)(1) (i) through (iv). The owner or operator of an enclosure that does not meet these requirements may apply to the Administrator for approval of the enclosure as a total enclosure on a case-by-case basis. The enclosure shall be considered a total enclosure if it is demonstrated to the satisfaction of the Administrator that all HAP emissions from the affected emission point(s) are contained and vented to the control device. The requirements for automatic approval are as follows:

(i) The total area of all natural draft openings shall not exceed 5 percent of the total surface area of the total enclosure's walls, floor, and ceiling;

(ii) All sources of emissions within the enclosure shall be a minimum of four equivalent diameters away from each natural draft opening;

(iii) The average inward face velocity (FV) across all natural draft openings shall be a minimum of 3,600 meters per hour as determined by the following procedures:

(A) All forced makeup air ducts and all exhaust ducts are constructed so that the volumetric flow rate in each can be accurately determined by the test methods specified in §63.805 (c)(2) and (3). Volumetric flow rates shall be calculated without the adjustment normally made for moisture content; and

(B) Determine FV by the following equation:

$$FV = \frac{\sum_{j=1}^n Q_{out j} - \sum_{i=1}^p Q_{in i}}{\sum_{k=1}^q A_k} \quad (\text{Equation 7})$$

(iv) All access doors and windows whose areas are not included as natural draft openings and are not included in the calculation of FV shall be closed during routine operation of the process.

(2) Determine the control device efficiency using Equation (5), and the test methods and procedures specified in §63.805 (c)(1) through (6).

(3) For each affected source complying with §63.802(a)(1) in accordance with §63.804(a)(3), compliance is demonstrated if:

(i) The installation of a permanent total enclosure is demonstrated (N=1);

(ii) The value of F is determined from Equation (5); and

(iii) The product of (F×N)(100) yields a value (R) such that the value of E<sub>ac</sub> in Equation 2 is no greater than 1.0.

(4) For each new affected source complying with §63.802(b)(1) in accordance with §63.804(d)(3), compliance is demonstrated if:

(i) The installation of a permanent total enclosure is demonstrated (N = 1);

(ii) The value of F is determined from Equation (5); and

(iii) The product of (F×N)(100) yields a value (R) such that the value of E<sub>ac</sub> in Equation 4 is no greater than 0.8.

(5) For each affected source complying with §63.802(a)(2)(ii) in accordance with §63.804(c)(2), compliance is demonstrated if:

- (i) The installation of a permanent total enclosure is demonstrated ( $N=1$ );
- (ii) The value of  $F$  is determined from Equation (5); and
- (iii) The product of  $(F \times N)(100)$  yields a value ( $R$ ) such that the value of  $G_{ac}$  in Equation 3 is no greater than 1.0.

(6) For each new affected source complying with §63.802(b)(2) in accordance with §63.804(e)(2), compliance is demonstrated if:

- (i) The installation of a permanent total enclosure is demonstrated ( $N=1$ );
- (ii) The value of  $F$  is determined from Equation (5); and
- (iii) The product of  $(F \times N)(100)$  yields a value ( $R$ ) such that the value of  $G_{ac}$  in Equation 3 is no greater than 0.2.

### **§ 63.806 Recordkeeping requirements.**

(a) The owner or operator of an affected source subject to this subpart shall fulfill all recordkeeping requirements of §63.10 of subpart A, according to the applicability criteria in §63.800(d) of this subpart.

(b) The owner or operator of an affected source subject to the emission limits in §63.802 of this subpart shall maintain records of the following:

(1) A certified product data sheet for each finishing material, thinner, contact adhesive, and strippable spray booth coating subject to the emission limits in §63.802; and

(2) The VHAP content, in kg VHAP/kg solids (lb VHAP/lb solids), as applied, of each finishing material and contact adhesive subject to the emission limits in §63.802; and

(3) The VOC content, in kg VOC/kg solids (lb VOC/lb solids), as applied, of each strippable booth coating subject to the emission limits in §63.802 (a)(3) or (b)(3).

(c) The owner or operator of an affected source following the compliance method in §63.804 (a)(1) or (d)(1) shall maintain copies of the averaging calculation for each month following the compliance date, as well as the data on the quantity of coatings and thinners used that is necessary to support the calculation of  $E$  in Equation 1.

(d) The owner or operator of an affected source following the compliance procedures of §63.804 (f)(3)(ii) and (g)(3)(ii) shall maintain the records required by §63.806(b) as well as records of the following:

(1) Solvent and coating additions to the continuous coater reservoir;

(2) Viscosity measurements; and

(3) Data demonstrating that viscosity is an appropriate parameter for demonstrating compliance.

(e) The owner or operator of an affected source subject to the work practice standards in §63.803 of this subpart shall maintain onsite the work practice implementation plan and all records associated with fulfilling the requirements of that plan, including, but not limited to:

(1) Records demonstrating that the operator training program required by §63.803(b) is in place;

(2) Records collected in accordance with the inspection and maintenance plan required by §63.803(c);

- (3) Records associated with the cleaning solvent accounting system required by §63.803(d);
- (4) Records associated with the limitation on the use of conventional air spray guns showing total finishing material usage and the percentage of finishing materials applied with conventional air spray guns for each semiannual period as required by §63.803(h)(5).
- (5) Records associated with the formulation assessment plan required by §63.803(l); and
- (6) Copies of documentation such as logs developed to demonstrate that the other provisions of the work practice implementation plan are followed.
- (f) The owner or operator of an affected source following the compliance method of §63.804 (f)(4) or (g)(4) shall maintain copies of the calculations demonstrating that the overall control efficiency (R) of the control system results in the value of  $E_{ac}$  required by Equations 2 or 4, records of the operating parameter values, and copies of the semiannual compliance reports required by §63.807(d).
- (g) The owner or operator of an affected source following the compliance method of §63.804 (f)(6) or (g)(6), shall maintain copies of the calculations demonstrating that the overall control efficiency (R) of the control system results in the applicable value of  $G_{ac}$  calculated using Equation 3, records of the operating parameter values, and copies of the semiannual compliance reports required by §63.807(d).
- (h) The owner or operator of an affected source subject to the emission limits in §63.802 and following the compliance provisions of §63.804(f) (1), (2), (3), (5), (7) and (8) and §63.804(g) (1), (2), (3), (5), (7), and (8) shall maintain records of the compliance certifications submitted in accordance with §63.807(c) for each semiannual period following the compliance date.
- (i) The owner or operator of an affected source shall maintain records of all other information submitted with the compliance status report required by §63.9(h) and §63.807(b) and the semiannual reports required by §63.807(c).
- (j) The owner or operator of an affected source shall maintain all records in accordance with the requirements of §63.10(b)(1).

### **§ 63.807 Reporting requirements.**

- (a) The owner or operator of an affected source subject to this subpart shall fulfill all reporting requirements of §63.7 through §63.10 of subpart A (General Provisions) according to the applicability criteria in §63.800(d) of this subpart.
- (b) The owner or operator of an affected source demonstrating compliance in accordance with §63.804(f) (1), (2), (3), (5), (7) and (8) shall submit the compliance status report required by §63.9(h) of subpart A (General Provisions) no later than 60 days after the compliance date. The report shall include the information required by §63.804(f) (1), (2), (3), (5), (7), and (8) of this subpart.
- (c) The owner or operator of an affected source demonstrating compliance in accordance with §63.804(g) (1), (2), (3), (5), (7), and (8) shall submit a report covering the previous 6 months of wood furniture manufacturing operations:
- (1) The first report shall be submitted 30 calendar days after the end of the first 6-month period following the compliance date.
  - (2) Subsequent reports shall be submitted 30 calendar days after the end of each 6-month period following the first report.
  - (3) The semiannual reports shall include the information required by §63.804(g) (1), (2), (3), (5), (7), and (8), a statement of whether the affected source was in compliance or noncompliance, and, if the affected source was in noncompliance, the measures taken to bring the affected source into compliance.
  - (4) The frequency of the reports required by paragraph (c) of this section shall not be reduced from semiannually regardless of the history of the owner's or operator's compliance status.

(d) The owner or operator of an affected source demonstrating compliance in accordance with §63.804(g) (4) and (6) of this subpart shall submit the excess emissions and continuous monitoring system performance report and summary report required by §63.10(e) of subpart A. The report shall include the monitored operating parameter values required by §63.804(g) (4) and (6). If the source experiences excess emissions, the report shall be submitted quarterly for at least 1 year after the excess emissions occur and until a request to reduce reporting frequency is approved, as indicated in §63.10(e)(3)(C). If no excess emissions occur, the report shall be submitted semiannually.

(e) The owner or operator of an affected source required to provide a written notification under §63.803(1)(4) shall include in the notification one or more statements that explains the reasons for the usage increase. The notification shall be submitted no later than 30 calendar days after the end of the annual period in which the usage increase occurred.

### **§ 63.808 Implementation and enforcement.**

(a) This subpart can be implemented and enforced by the U.S. EPA, or a delegated authority such as the applicable State, local, or Tribal agency. If the U.S. EPA Administrator has delegated authority to a State, local, or Tribal agency, then that agency, in addition to the U.S. EPA, has the authority to implement and enforce this subpart. Contact the applicable U.S. EPA Regional Office to find out if implementation and enforcement of this subpart is delegated to a State, local, or Tribal agency.

(b) In delegating implementation and enforcement authority of this subpart to a State, local, or Tribal agency under subpart E of this part, the authorities contained in paragraph (c) of this section are retained by the Administrator of U.S. EPA and cannot be transferred to the State, local, or Tribal agency.

(c) The authorities that cannot be delegated to State, local, or Tribal agencies are as specified in paragraphs (c)(1) through (5) of this section.

(1) Approval of alternatives to the requirements in §§63.800, 63.802, and 63.803(a)(1), (b), (c) introductory text, and (d) through (l).

(2) Approval of alternatives to the monitoring and compliance requirements in §§63.804(f)(4)(iv)(D) and (E), 63.804(g)(4)(iii)(C), 63.804(g)(4)(vi), and 63.804(g)(6)(vi).

(3) Approval of major alternatives to test methods under §63.7(e)(2)(ii) and (f), as defined in §63.90, and as required in this subpart, as well as approval of any alternatives to the specific test methods under §§63.805(a), 63.805(d)(2)(v), and 63.805(e)(1).

(4) Approval of major alternatives to monitoring under §63.8(f), as defined in §63.90, and as required in this subpart.

(5) Approval of major alternatives to recordkeeping and reporting under §63.10(f), as defined in §63.90, and as required in this subpart.

[68 FR 37354, June 23, 2003]

### **§§ 63.809-63.819 [Reserved]**

**Table 1 to Subpart JJ of Part 63—General Provisions Applicability to Subpart JJ**

<b>Reference</b>	<b>Applies to subpart JJ</b>	<b>Comment</b>
63.1(a)	Yes	
63.1(b)(1)	No	Subpart JJ specifies applicability.
63.1(b)(2)	Yes	

63.1(b)(3)	Yes	
63.1(c)(1)	No	Subpart JJ specifies applicability.
63.1(c)(2)	No	Area sources are not subject to subpart JJ.
63.1(c)(4)	Yes	
63.1(c)(5)	Yes	
63.1(e)	Yes	
63.2	Yes	Additional terms are defined in 63.801(a) of subpart JJ. When overlap between subparts A and JJ occurs, subpart JJ takes precedence.
63.3	Yes	Other units used in subpart JJ are defined in 63.801(b).
63.4	Yes	
63.5	Yes	
63.6(a)	Yes	
63.6(b)(1)	Yes	
63.6(b)(2)	Yes	
63.6(b)(3)	Yes	
63.6(b)(4)	No	May apply when standards are proposed under Section 112(f) of the CAA.
63.6(b)(5)	Yes	
63.6(b)(7)	Yes	
63.6(c)(1)	Yes	
63.6(c)(2)	No	
63.6(c)(5)	Yes	
63.6(e)(1)	Yes	
63.6(e)(2)	Yes	
63.6(e)(3)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.6(f)(1)	No	Affected sources complying through the procedures specified in 63.804 (a)(1), (a)(2), (b), (c)(1), (d)(1), (d)(2), (e)(1), and (e)(2) are subject to the emission standards at all times, including periods of startup, shutdown, and malfunction.
63.6(f)(2)	Yes	
63.6(f)(3)	Yes	
63.6(g)	Yes	
63.6(h)	No	
63.6 (i)(1)– (i)(3)	Yes	
63.6(i)(4)(i)	Yes	
63.6(i)(4)(ii)	No	
63.6 (i)(5)–	Yes	

(i)(14)		
63.6(i)(16)	Yes	
63.6(j)	Yes	
63.7	Yes	Applies only to affected sources using a control device to comply with the rule.
63.8	Yes	Applies only to affected sources using a control device to comply with the rule.
63.9(a)	Yes	
63.9(b)	Yes	Existing sources are required to submit initial notification report within 270 days of the effective date.
63.9(c)	Yes	
63.9(d)	Yes	
63.9(e)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.9(f)	No	
63.9(g)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.9(h)	Yes	63.9(h)(2)(ii) applies only to affected sources using a control device to comply with the rule.
63.9(i)	Yes	
63.9(j)	Yes	
63.10(a)	Yes	
63.10(b)(1)	Yes	
63.10(b)(2)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.10(b)(3)	Yes	
63.10(c)	Yes	
63.10(d)(1)	Yes	
63.10(d)(2)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.10(d)(3)	No	
63.10(d)(4)	Yes	
63.10(d)(5)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.10(e)	Yes	Applies only to affected sources using a control device to comply with the rule.
63.10(f)	Yes	
63.11	No	
63.12–63.15	Yes	

**Table 2 to Subpart JJ of Part 63—List of Volatile Hazardous Air Pollutants**

Chemical name	CAS No.
Acetaldehyde	75070

Acetamide	60355
Acetonitrile	75058
Acetophenone	98862
2-Acetylaminofluorine	53963
Acrolein	107028
Acrylamide	79061
Acrylic acid	79107
Acrylonitrile	107131
Allyl chloride	107051
4-Aminobiphenyl	92671
Aniline	62533
o-Anisidine	90040
Benzene	71432
Benzidine	92875
Benzotrichloride	98077
Benzyl chloride	100447
Biphenyl	92524
Bis (2-ethylhexyl) phthalate (DEHP)	117817
Bis (chloromethyl) ether	542881
Bromoform	75252
1,3-Butadiene	106990
Carbon disulfide	75150
Carbon tetrachloride	56235
Carbonyl sulfide	463581
Catechol	120809
Chloroacetic acid	79118
2-Chloroacetophenone	532274
Chlorobenzene	108907
Chloroform	67663
Chloromethyl methyl ether	107302
Chloroprene	126998

Cresols (isomers and mixture)	1319773
o-Cresol	95487
m-Cresol	108394
p-Cresol	106445
Cumene	98828
2,4-D (2,4-Dichlorophenoxyacetic acid, including salts and esters)	94757
DDE (1,1-Dichloro-2,2-bis(p-chlorophenyl)ethylene)	72559
Diazomethane	334883
Dibenzofuran	132649
1,2-Dibromo-3-chloropropane	96128
Dibutylphthalate	84742
1,4-Dichlorobenzene	106467
3,3'-Dichlorobenzidine	91941
Dichloroethyl ether (Bis(2-chloroethyl)ether)	111444
1,3-Dichloropropene	542756
Diethanolamine	111422
N,N-Dimethylaniline	121697
Diethyl sulfate	64675
3,3'-Dimethoxybenzidine	119904
4-Dimethylaminoazobenzene	60117
3,3'-Dimethylbenzidine	119937
Dimethylcarbamoyl chloride	79447
N,N-Dimethylformamide	68122
1,1-Dimethylhydrazine	57147
Dimethyl phthalate	131113
Dimethyl sulfate	77781
4,6-Dinitro-o-cresol, and salts	534521
2,4-Dinitrophenol	51285
2,4-Dinitrotoluene	121142
1,4-Dioxane (1,4-Diethyleneoxide)	123911
1,2-Diphenylhydrazine	122667

Epichlorohydrin (1-Chloro-2,3-epoxypropane)	106898
1,2-Epoxybutane	106887
Ethyl acrylate	140885
Ethylbenzene	100414
Ethyl carbamate (Urethane)	51796
Ethyl chloride (Chloroethane)	75003
Ethylene dibromide (Dibromoethane)	106934
Ethylene dichloride (1,2-Dichloroethane)	107062
Ethylene glycol	107211
Ethylene oxide	75218
Ethylenethiourea	96457
Ethylidene dichloride (1,1-Dichloroethane)	75343
Formaldehyde	50000
Glycoethers <sup>a</sup>	
Hexachlorobenzene	118741
Hexachloro-1,3-butadiene	87683
Hexachloroethane	67721
Hexamethylene-1,6-diisocyanate	822060
Hexamethylphosphoramide	680319
Hexane	110543
Hydrazine	302012
Hydroquinone	123319
Isophorone	78591
Maleic anhydride	108316
Methanol	67561
Methyl bromide (Bromomethane)	74839
Methyl chloride (Chloromethane)	74873
Methyl chloroform (1,1,1-Trichloroethane)	71556
Methyl ethyl ketone (2-Butanone)	78933
Methylhydrazine	60344
Methyl iodide (Iodomethane)	74884

Methyl isobutyl ketone (Hexone)	108101
Methyl isocyanate	624839
Methyl methacrylate	80626
Methyl tert-butyl ether	1634044
4,4'-Methylenebis (2-chloroaniline)	101144
Methylene chloride (Dichloromethane)	75092
4,4'-Methylenediphenyl diisocyanate (MDI)	101688
4,4'-Methylenedianiline	101779
Naphthalene	91203
Nitrobenzene	98953
4-Nitrobiphenyl	92933
4-Nitrophenol	100027
2-Nitropropane	79469
N-Nitroso-N-methylurea	684935
N-Nitrosodimethylamine	62759
N-Nitrosomorpholine	59892
Phenol	108952
p-Phenylenediamine	106503
Phosgene	75445
Phthalic anhydride	85449
Polychlorinated biphenyls (Aroclors)	1336363
Polycyclic Organic Matter <sup>b</sup>	
1,3-Propane sultone	1120714
beta-Propiolactone	57578
Propionaldehyde	123386
Propoxur (Baygon)	114261
Propylene dichloride (1,2-Dichloropropane)	78875
Propylene oxide	75569
1,2-Propylenimine (2-Methyl aziridine)	75558
Quinone	106514
Styrene	100425

Styrene oxide	96093
2,3,7,8-Tetrachlorodibenzo-p-dioxin	1746016
1,1,2,2-Tetrachloroethane	79345
Tetrachloroethylene (Perchloroethylene)	127184
Toluene	108883
2,4-Toluenediamine	95807
Toluene-2,4-diisocyanate	584849
o-Toluidine	95534
1,2,4-Trichlorobenzene	120821
1,1,2-Trichloroethane	79005
Trichloroethylene	79016
2,4,5-Trichlorophenol	95954
2,4,6-Trichlorophenol	88062
Triethylamine	121448
Trifluralin	1582098
2,2,4-Trimethylpentane	540841
Vinyl acetate	108054
Vinyl bromide	593602
Vinyl chloride	75014
Vinylidene chloride (1,1-Dichloroethylene)	75354
Xylenes (isomers and mixture)	1330207
o-Xylene	95476
m-Xylene	108383
p-Xylene	106423

<sup>a</sup>Includes mono- and di-ethers of ethylene glycol, diethylene glycols and triethylene glycol; R-(OCH<sub>2</sub>CH<sub>2</sub>)<sub>n</sub>-OR where:

n = 1, 2, or 3,

R = alkyl or aryl groups

R' = R, H, or groups which, when removed, yield glycol ethers with the structure: R-(OCH<sub>2</sub>CH<sub>2</sub>)<sub>n</sub>-OH. Polymers are excluded from the glycol category.

<sup>b</sup>Includes organic compounds with more than one benzene ring, and which have a boiling point greater than or equal to 100°C.

[63 FR 71381, Dec. 28, 1998]

**Table 3 to Subpart JJ of Part 63—Summary of Emission Limits**

Emission point	Existing source	New source
<b>Finishing Operations:</b>		
(a) Achieve a weighted average VHAP content across all coatings (maximum kg VHAP/kg solids [lb VHAP/lb solids], as applied)	<sup>a</sup> 1.0	<sup>a</sup> 0.8
(b) Use compliant finishing materials (maximum kg VHAP/kg solids [lb VHAP/lb solids], as applied):		
—stains	<sup>a</sup> 1.0	<sup>a</sup> 1.0
—washcoats	<sup>a,b</sup> 1.0	<sup>a,b</sup> 0.8
—sealers	<sup>a</sup> 1.0	<sup>a</sup> 0.8
—topcoats	<sup>a</sup> 1.0	<sup>a</sup> 0.8
—basecoats	<sup>a,b</sup> 1.0	<sup>a,b</sup> 0.8
—enamels	<sup>a,b</sup> 1.0	<sup>a,b</sup> 0.8
—thinners (maximum percent VHAP allowable); or	10.0	10.0
(c) As an alternative, use control device; or	<sup>c</sup> 1.0	<sup>c</sup> 0.8
(d) Use any combination of (a), (b), and (c)	1.0	0.8
<b>Cleaning Operations:</b>		
Strippable spray booth material (maximum VOC content, kg VOC/kg solids [lb VOC/lb solids])	0.8	0.8
<b>Contact Adhesives:</b>		
(a) Use compliant contact adhesives (maximum kg VHAP/kg solids [lb VHAP/lb solids], as applied) based on following criteria:		
i. For aerosol adhesives, and for contact adhesives applied to nonporous substrates	<sup>d</sup> NA	<sup>d</sup> NA
ii. For foam adhesives used in products that meet flammability requirements	1.8	0.2
iii. For all other contact adhesives (including foam adhesives used in products that do not meet flammability requirements); or	1.0	0.2
(b) Use a control device	<sup>e</sup> 1.0	<sup>e</sup> 0.2

<sup>a</sup>The limits refer to the VHAP content of the coating, as applied.

<sup>b</sup>Washcoats, basecoats, and enamels must comply with the limits presented in this table if they are purchased premade, that is, if they are not formulated onsite by thinning other finishing materials. If they are formulated onsite, they must be formulated using compliant finishing materials, i.e., those that meet the limits specified in this table, and thinners containing no more than 3.0 percent VHAP by weight.

<sup>c</sup>The control device must operate at an efficiency that is equivalent to no greater than 1.0 kilogram (or 0.8 kilogram) of VHAP being emitted from the affected emission source per kilogram of solids used.

<sup>d</sup>There is no limit on the VHAP content of these adhesives.

<sup>e</sup>The control device must operate at an efficiency that is equivalent to no greater than 1.0 kilogram (or 0.2 kilogram) of VHAP being emitted from the affected emission source per kilogram of solids used.

[60 FR 62936, Dec. 7, 1995, as amended at 62 FR 30260, June 3, 1997]

**Table 4 to Subpart JJ of Part 63—Pollutants Excluded From Use in Cleaning and Washoff Solvents**

Chemical name	CAS No.
4-Aminobiphenyl	92671
Styrene oxide	96093
Diethyl sulfate	64675
N-Nitrosomorpholine	59892
Dimethyl formamide	68122
Hexamethylphosphoramide	680319
Acetamide	60355
4,4'-Methylenedianiline	101779
o-Anisidine	90040
2,3,7,8-Tetrachlorodibenzo-p-dioxin	1746016
Beryllium salts	
Benzidine	92875
N-Nitroso-N-methylurea	684935
Bis (chloromethyl) ether	542881
Dimethyl carbamoyl chloride	79447
Chromium compounds (hexavalent)	
1,2-Propylenimine (2-Methyl aziridine)	75558
Arsenic and inorganic arsenic compounds	99999904
Hydrazine	302012
1,1-Dimethyl hydrazine	57147
Beryllium compounds	7440417
1,2-Dibromo-3-chloropropane	96128
N-Nitrosodimethylamine	62759
Cadmium compounds	
Benzo (a) pyrene	50328

Polychlorinated biphenyls (Aroclors)	1336363
Heptachlor	76448
3,3'-Dimethyl benzidine	119937
Nickel subsulfide	12035722
Acrylamide	79061
Hexachlorobenzene	118741
Chlordane	57749
1,3-Propane sultone	1120714
1,3-Butadiene	106990
Nickel refinery dust	
2-Acetylaminoflourine	53963
3,3'-Dichlorobenzidine	53963
Lindane (hexachlorcyclohexane, gamma)	58899
2,4-Toluene diamine	95807
Dichloroethyl ether (Bis(2-chloroethyl) ether)	111444
1,2-Diphenylhydrazine	122667
Toxaphene (chlorinated camphene)	8001352
2,4-Dinitrotoluene	121142
3,3'-Dimethoxybenzidine	119904
Formaldehyde	50000
4,4'-Methylene bis (2-chloroaniline)	101144
Acrylonitrile	107131
Ethylene dibromide (1,2-Dibromoethane)	106934
DDE (1,1-p-chlorophenyl 1-2 dichloroethylene)	72559
Chlorobenzilate	510156
Dichlorvos	62737
Vinyl chloride	75014
Coke Oven Emissions	
Ethylene oxide	75218
Ethylene thiourea	96457
Vinyl bromide (bromoethene)	593602

Selenium sulfide (mono and di)	7488564
Chloroform	67663
Pentachlorophenol	87865
Ethyl carbamate (Urethane)	51796
Ethylene dichloride (1,2-Dichloroethane)	107062
Propylene dichloride (1,2-Dichloropropane)	78875
Carbon tetrachloride	56235
Benzene	71432
Methyl hydrazine	60344
Ethyl acrylate	140885
Propylene oxide	75569
Aniline	62533
1,4-Dichlorobenzene(p)	106467
2,4,6-Trichlorophenol	88062
Bis (2-ethylhexyl) phthalate (DEHP)	117817
o-Toluidine	95534
Propoxur	114261
1,4-Dioxane (1,4-Diethyleneoxide)	123911
Acetaldehyde	75070
Bromoform	75252
Captan	133062
Epichlorohydrin	106898
Methylene chloride (Dichloromethane)	75092
Dibenz (ah) anthracene	53703
Chrysene	218019
Dimethyl aminoazobenzene	60117
Benzo (a) anthracene	56553
Benzo (b) fluoranthene	205992
Antimony trioxide	1309644
2-Nitropropane	79469
1,3-Dichloropropene	542756

7, 12-Dimethylbenz(a) anthracene	57976
Benz(c) acridine	225514
Indeno(1,2,3-cd)pyrene	193395
1,2:7,8-Dibenzopyrene	189559

[63 FR 71382, Dec. 28, 1998]

**Table 5 to Subpart JJ of Part 63—List of VHAP of Potential Concern Identified by Industry**

CAS No.	Chemical name	EPA de minimis, tons/yr
68122	Dimethyl formamide	1.0
50000	Formaldehyde	0.2
75092	Methylene chloride	4.0
79469	2-Nitropropane	1.0
78591	Isophorone	0.7
1000425	Styrene monomer	1.0
108952	Phenol	0.1
111422	Dimethanolamine	5.0
109864	2-Methoxyethanol	10.0
111159	2-Ethoxyethyl acetate	10.0

[63 FR 71382, Dec. 28, 1998]

**Table 6 to Subpart JJ of Part 63—VHAP of Potential Concern**

CAS No.	Chemical name	EPA de minimis, tons/yr*
92671	4-Aminobiphenyl	1.0
96093	Styrene oxide	1.0
64675	Diethyl sulfate	1.0
59892	N-Nitrosomorpholine	1.0
68122	Dimethyl formamide	1.0
680319	Hexamethylphosphoramide	0.01
60355	Acetamide	1.0
101779	4,4'-Methylenedianiline	1.0
90040	o-Anisidine	1.0
1746016	2,3,7,8-Tetrachlorodibenzo-p-dioxin	0.00000006

92875	Benzidine	0.00003
684935	N-Nitroso-N-methylurea	0.00002
542881	Bis(chloromethyl) ether	0.00003
79447	Dimethyl carbamoyl chloride	0.002
75558	1,2-Propylenimine (2-Methyl aziridine)	0.0003
57147	1,1-Dimethyl hydrazine	0.0008
96128	1,2-Dibromo-3-chloropropane	0.001
62759	N-Nitrosodimethylamine	0.0001
50328	Benzo (a) pyrene	0.001
1336363	Polychlorinated biphenyls (Aroclors)	0.0009
76448	Heptachlor	0.002
119937	3,3'-Dimethyl benzidine	0.001
79061	Acrylamide	0.002
118741	Hexachlorobenzene	0.004
57749	Chlordane	0.005
1120714	1,3-Propane sultone	0.003
106990	1,3-Butadiene	0.007
53963	2-Acetylaminoflourine	0.0005
91941	3,3'-Dichlorobenzidine	0.02
58899	Lindane (hexachlorocyclohexane, gamma)	0.005
95807	2,4-Toluene diamine	0.002
111444	Dichloroethyl ether (Bis(2-chloroethyl)ether)	0.006
122667	1,2—Diphenylhydrazine	0.009
8001352	Toxaphene (chlorinated camphene)	0.006
121142	2,4-Dinitrotoluene	0.002
119904	3,3'-Dimethoxybenzidine	0.01
50000	Formaldehyde	0.2
101144	4,4'-Methylene bis(2-chloroaniline)	0.02
107131	Acrylonitrile	0.03
106934	Ethylene dibromide(1,2-Dibromoethane)	0.01
72559	DDE (1,1-p-chlorophenyl 1–2 dichloroethylene)	0.01

510156	Chlorobenzilate	0.04
62737	Dichlorvos	0.02
75014	Vinyl chloride	0.02
75218	Ethylene oxide	0.09
96457	Ethylene thiourea	0.06
593602	Vinyl bromide (bromoethene)	0.06
67663	Chloroform	0.09
87865	Pentachlorophenol	0.07
51796	Ethyl carbamate (Urethane)	0.08
107062	Ethylene dichloride (1,2-Dichloroethane)	0.08
78875	Propylene dichloride (1,2-Dichloropropane)	0.1
56235	Carbon tetrachloride	0.1
71432	Benzene	0.2
140885	Ethyl acrylate	0.1
75569	Propylene oxide	0.5
62533	Aniline	0.1
106467	1,4-Dichlorobenzene(p)	0.3
88062	2,4,6-Trichlorophenol	0.6
117817	Bis (2-ethylhexyl) phthalate (DEHP)	0.5
95534	o-Toluidine	0.4
114261	Propoxur	2.0
79016	Trichloroethylene	1.0
123911	1,4-Dioxane (1,4-Diethyleneoxide)	0.6
75070	Acetaldehyde	0.9
75252	Bromoform	2.0
133062	Captan	2.0
106898	Epichlorohydrin	2.0
75092	Methylene chloride (Dichloromethane)	4.0
127184	Tetrachloroethylene (Perchloroethylene)	4.0
53703	Dibenz (ah) anthracene	0.01
218019	Chrysene	0.01

60117	Dimethyl aminoazobenzene	1.0
56553	Benzo (a) anthracene	0.01
205992	Benzo (b) fluoranthene	0.01
79469	2-Nitropropane	1.0
542756	1,3-Dichloropropene	1.0
57976	7,12-Dimethylbenz (a) anthracene	0.01
225514	Benz(c)acridine	0.01
193395	Indeno(1,2,3-cd)pyrene	0.01
189559	1,2:7,8-Dibenzopyrene	0.01
79345	1,1,2,2-Tetrachloroethane	0.03
91225	Quinoline	0.0006
75354	Vinylidene chloride (1,1-Dichloroethylene)	0.04
87683	Hexachlorobutadiene	0.09
82688	Pentachloronitrobenzene (Quintobenzene)	0.03
78591	Isophorone	0.7
79005	1,1,2-Trichloroethane	0.1
74873	Methyl chloride (Chloromethane)	1.0
67721	Hexachloroethane	0.5
1582098	Trifluralin	0.9
1319773	Cresols/Cresylic acid (isomers and mixture)	1.0
108394	m-Cresol	1.0
75343	Ethylidene dichloride (1,1-Dichloroethane)	1.0
95487	o-Cresol	1.0
106445	p-Cresol	1.0
74884	Methyl iodide (Iodomethane)	1.0
100425	Styrene	1.0
107051	Allyl chloride	1.0
334883	Diazomethane	1.0
95954	2,4,5—Trichlorophenol	1.0
133904	Chloramben	1.0
106887	1,2—Epoxybutane	1.0

108054	Vinyl acetate	1.0
126998	Chloroprene	1.0
123319	Hydroquinone	1.0
92933	4-Nitrobiphenyl	1.0
56382	Parathion	0.1
13463393	Nickel Carbonyl	0.1
60344	Methyl hydrazine	0.006
151564	Ethylene imine	0.0003
77781	Dimethyl sulfate	0.1
107302	Chloromethyl methyl ether	0.1
57578	beta-Propiolactone	0.1
100447	Benzyl chloride	0.04
98077	Benzotrichloride	0.0006
107028	Acrolein	0.04
584849	2,4—Toluene diisocyanate	0.1
75741	Tetramethyl lead	0.01
78002	Tetraethyl lead	0.01
12108133	Methylcyclopentadienyl manganese	0.1
624839	Methyl isocyanate	0.1
77474	Hexachlorocyclopentadiene	0.1
62207765	Fluomine	0.1
10210681	Cobalt carbonyl	0.1
79118	Chloroacetic acid	0.1
534521	4,6-Dinitro-o-cresol, and salts	0.1
101688	Methylene diphenyl diisocyanate	0.1
108952	Phenol	0.1
62384	Mercury, (acetato-o) phenyl	0.01
98862	Acetophenone	1.0
108316	Maleic anhydride	1.0
532274	2-Chloroacetophenone	0.06
51285	2,4-Dinitrophenol	1.0

109864	2-Methoxy ethanol	10.0
98953	Nitrobenzene	1.0
74839	Methyl bromide (Bromomethane)	10.0
75150	Carbon disulfide	1.0
121697	N,N-Dimethylaniline	1.0
106514	Quinone	5.0
123386	Propionaldehyde	5.0
120809	Catechol	5.0
85449	Phthalic anhydride	5.0
463581	Carbonyl sulfide	5.0
132649	Dibenzofurans	5.0
100027	4-Nitrophenol	5.0
540841	2,2,4-Trimethylpentane	5.0
111422	Diethanolamine	5.0
822060	Hexamethylene-1,6-diisocyanate	5.0
	Glycol ethers <sup>a</sup>	5.0
	Polycyclic organic matter <sup>b</sup>	0.01

\*These values are based on the de minimis levels provided in the proposed rulemaking pursuant to section 112(g) of the Act using a 70-year lifetime exposure duration for all VHAP. Default assumptions and the de minimis values based on inhalation reference doses (RfC) are not changed by this adjustment.

<sup>a</sup>Except for ethylene glycol butyl ether, ethylene glycol ethyl ether (2-ethoxy ethanol), ethylene glycol hexyl ether, ethylene glycol methyl ether (2-methoxyethanol), ethylene glycol phenyl ether, ethylene glycol propyl ether, ethylene glycol mono-2-ethylhexyl ether, diethylene glycol butyl ether, diethylene glycol ethyl ether, diethylene glycol methyl ether, diethylene glycol hexyl ether, diethylene glycol phenyl ether, diethylene glycol propyl ether, triethylene glycol butyl ether, triethylene glycol ethyl ether, triethylene glycol methyl ether, triethylene glycol propyl ether, ethylene glycol butyl ether acetate, ethylene glycol ethyl ether acetate, and diethylene glycol ethyl ether acetate.

<sup>b</sup>Except for benzo(b)fluoranthene, benzo(a)anthracene, benzo(a)pyrene, 7,12-dimethylbenz(a)anthracene, benz(c)acridine, chrysene, dibenz(ah)anthracene, 1,2:7,8-dibenzopyrene, indeno(1,2,3-cd)pyrene, but including dioxins and furans.

[63 FR 71383, Dec. 28, 1998]

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

Technical Support Document (TSD) for a Part 70 Operating Permit Renewal

**Source Background and Description**

<b>Source Name:</b>	<b>Inwood Office Furniture Co., Inc.</b>
<b>Source Location:</b>	<b>1108 East 15<sup>th</sup> Street, Jasper, Indiana 47546</b>
<b>County:</b>	<b>Dubois</b>
<b>SIC Code:</b>	<b>2521</b>
<b>Permit Renewal No.:</b>	<b>T037-29306-00012</b>
<b>Permit Reviewer:</b>	<b>Donald McQuigg</b>

The Office of Air Quality (OAQ) has reviewed the operating permit renewal application from Inwood Office Furniture Co., Inc., relating to the operation of a stationary wood furniture manufacturing plant. On May 26, 2010, Inwood Office Furniture Co., Inc. submitted an application to the OAQ requesting to renew its operating permit. Inwood Office Furniture Co., Inc. was issued its first Part 70 Operating Permit Renewal T037-17564-00012 on February 28, 2006

**Permitted Emission Units and Pollution Control Equipment**

The source consists of the following permitted emission units:

- (a) Surface coating line 1 operations (booths EU 01 through EU 12) consisting of the following:
- (1) One (1) contact glue booth (EU 01) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack A. This booth was installed prior to 1974.
  - (2) Three (3) stain booths (EU 02, EU 03 and EU 04) with a maximum throughput rate of 3 units per hour each, controlled by dry filters and exhausting at stacks B, C and D. These booths were installed prior to 1974.
  - (3) One (1) wipe stain booth (EU 05) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack E. This booth was installed prior to 1974.
  - (4) One (1) sealer booth (EU 06) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack F. This booth was installed prior to 1974.
  - (5) One (1) lacquer booth (EU 07) with a maximum throughput rate of 10 units per hour, controlled by dry filters and exhausting at stack G. This booth was installed prior to 1974.
  - (6) One (1) lacquer booth (EU 08) with a maximum throughput rate of 8 units per hour, controlled by dry filters and exhausting at stack H. This booth was installed prior to 1974.

- (7) One (1) wipe stain booth (EU 09) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack I. This booth was installed prior to 1974.
- (8) One (1) lacquer booth (EU 10) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack J. This booth was installed prior to 1974.
- (9) One (1) black enamel booth (EU 11) with a maximum throughput rate of 11.1 units per hour, controlled by dry filters and exhausting at stack K. This booth was installed in 1998.
- (10) One (1) stain booth (EU 12) with a maximum throughput rate of 1.1 units per hour, controlled by dry filters and exhausting at stack L. This booth was installed prior to 1974.

Under 40 CFR 63, Subpart JJ, the surface coating line 1, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (a) refers to desks and desktops.

(b) Surface coating line 2 operation consisting of the following:

- (1) One (1) SAP/NGR Booth (identified as EU 21/EU 22) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stacks 2A and 2B. This booth was installed in 2000.
- (2) One (1) Wash Coat Booth (identified as EU 23) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2C. This booth was installed in 2000.
- (3) One (1) Stain Booth (identified as EU 25) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (4) One (1) Sealer Booth (identified as EU 27) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2F. This booth was installed in 2000.
- (5) One (1) First Topcoat Booth with one (1) flash tunnel (identified as EU 29) with a maximum throughput capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2H. The flash tunnel exhausts at stack 21. This booth was installed in 2000.
- (6) One (1) Second Topcoat Booth with one (1) flash tunnel (identified as EU 30) with a maximum rated capacity of 30 units per hour, controlled by dry filters and exhausting at stack 2J. The flash tunnel exhausts at stack 2K. This booth and flash tunnel were installed in 2000.

Under 40 CFR 63, Subpart JJ, the surface coating line 2, inclusive of all facilities, is considered an existing affected facility.

Note: The term "unit(s)" in the facility description item (b) refers to desks and desktops.

- (c) One (1) Final Touch-up Sanding Booth (identified as EU 32) with a maximum throughput capacity of 7.50 tons of wood per hour and controlled by a cartridge filter baghouse.

### **Emission Units and Pollution Control Equipment Constructed and/or Operated without a Permit**

The source also consists of the following emission units that were constructed and/or are operating without a permit:

- (a) One (1) Repair Sanding Booth, identified as EU 15, with a maximum capacity of ten (10) units per hour, using a baghouse as control, installed in 1995, and exhausting within the building.

### **Insignificant Activities**

The source also consists of the following insignificant activities:

- (a) Woodworking operations (identified as EU 14) with a maximum throughput rate of 2,750 pounds of wood per hour, controlled by a baghouse and exhausting at stack N. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6.5-1-2(a)]
- (b) One (1) natural gas-fired boiler (identified as EU 13) with a maximum heat input capacity of 2.60 MMBtu per hour and exhausting at stack M. [326 IAC 6.5-1-2(b)(3)]
- (c) One (1) natural gas-fired air makeup unit utilized for general building ventilation (identified as EU 33) with a maximum heat input capacity of 2.10 MMBtu per hour, and exhausting externally. [326 IAC 6.5-1-2(a)]
- (d) Seven (7) natural gas-fired air makeup units, two (2) integrated with the SAP/NGR Booth and one (1) integrated with each of the other five (5) surface coating booths located on the second surface coating line operations, each with a maximum heat input capacity of 1.50 MMBtu per hour and exhausting internally into the booth. [326 IAC 6.5-1-2(a)]
- (e) Two (2) natural gas-fired drying ovens (identified as EU 26 and EU 31) used in conjunction with the second surface coating line operations and each with a maximum heat input capacity of 1.00 MMBtu per hour. The ovens EU 26 and EU 31 exhaust at stacks 2E and 2L, respectively, and were installed in 2000. [326 IAC 6.5-1-2(a)]
- (f) One (1) natural gas-fired drying oven (identified as EU 28) used in conjunction with the second surface coating line operations and with a maximum heat input capacity of 4.0 MMBtu per hour. This oven exhausts at stacks 2G-1, 2G-2, and 2G-3, and was installed in 2000. [326 IAC 6.5-1-2(a)]
- (g) One (1) repair sanding booth (identified as EU 15), with a maximum capacity of ten (10) units per hour, installed in 1995, controlled by a baghouse and exhausting within the building. [326 IAC 2-7-1(21)(G)(xxix)] [326 IAC 6.5-1-2(a)]
- (h) Paved and unpaved roads and parking lots with public access. [326 IAC 6-4]

### **Air Pollution Control Justification as an Integral Part of the Process**

In October 1993, a Final Order Granting Summary Judgment was signed by Administrative Law Judge ("ALJ") Garrettson resolving an appeal filed by Kimball Hospitality Furniture, Inc. (Cause Nos. 92-A-J-730 and 92-A-J-833) related to the method by which IDEM calculated potential emissions from woodworking operations. In his findings, the ALJ determined that particulate controls are necessary for the facility to produce its normal product and are integral to the normal operation of the facility, and therefore, potential emissions should be calculated after controls. Based on this ruling, potential emissions for particulate matter were calculated after consideration of the controls for determining operating permit level purposes.

IDEM, OAQ has evaluated the justifications and agreed that the baghouses will be considered as an integral part of the woodworking operations. Therefore, the permitting level will be determined using the potential to emit after the baghouse. Operating conditions in the proposed permit will specify that the woodworking operation baghouses shall operate at all times when the woodworking operation is in running.

### Existing Approvals

Since the issuance of Part 70 Operating Permit Renewal T037-17564-00012 on February 28, 2006, the source has not been operating under any additional approvals.

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 and, therefore, were not incorporated into this Part 70 Operating Permit Renewal:

- (a) Methyl ethyl ketone (MEK) was not included as a HAP.

Reason not incorporated: The U.S. EPA delisted the compound methyl ethyl ketone (MEK) (2-Butanone) (CAS No. 78-93-3) from the list of hazardous air pollutants (HAPs) contained in the Clean Air Act (section 112), effective December 19, 2005.

- (b) Ethylene glycol monobutyl ether was not included as a HAP.

Reason not incorporated: The U.S. EPA delisted the compound ethylene glycol monobutyl ether (2-Butoxyethanol) (CAS No. 111-76-2) from the list of hazardous air pollutants (HAPs) contained in the Clean Air Act (section 112), effective November 29, 2004.

- (c) The requirements of the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters, (40 CFR 63, Subpart DDDDD) and 326 IAC 20-95 are not included for the 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 013).

Reason not incorporated: On June 8, 2007, the United States Court of appeals for the District of Columbia Circuit (in NRDC v. EPA, no. 04-1386) vacated in its entirety the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters, 40 CFR 63, Subpart DDDDD. Additionally, since the state rule at 326 IAC 20-95 incorporated the requirements of the NESHAP 40 CFR 63, Subpart DDDDD by reference, the requirements of 326 IAC 20-95 are no longer effective. Therefore, the requirements of 40 CFR 63, Subpart DDDDD and 326 IAC 20-95 have been removed from the permit.

The following terms and conditions from previous approvals have been revised in this Part 70 permit:

- (a) Repair Sanding Booth is added to the source insignificant activity list.

The repair sanding booth (EU 15) was installed in 1995 and operated prior to receipt of the proper permit. The uncontrolled potential to emit particulate matter is 50.7 tons per year, as determined in Appendix A; however, the limited potential to emit particulate matter is 5.1 tons per year. The repair sanding booth (EU 15) utilizes a baghouse for particulate control which operates at 99% control efficiency. Therefore, pursuant to 326

IAC 2-7-10.5(d)(4)(c)(i), the modification to add the repair sanding booth (EU 15) should have been processed as a minor source/permit modification.

**Enforcement Issue**

IDEM is aware that equipment has been constructed and operated prior to receipt of the proper permit. The subject equipment is listed in this Technical Support Document under the condition entitled "Emission Units and Pollution Control Equipment Constructed and/or Operated without a Permit".

- (a) IDEM is reviewing this matter and will take appropriate action. This proposed permit is intended to satisfy the requirements of the construction permit rules.

**Emission Calculations**

See Appendix A of this document for detailed emission calculations.

**County Attainment Status**

The source is located in Dubois County.

Pollutant	Designation
SO <sub>2</sub>	Better than national standards.
CO	Unclassifiable or attainment effective November 15, 1990.
O <sub>3</sub>	Unclassifiable or attainment effective June 15, 2004, for the 8-hour standard. <sup>1</sup>
PM <sub>10</sub>	Unclassifiable effective November 15, 1990.
NO <sub>2</sub>	Cannot be classified or better than national standards.
Pb	Not designated.
<sup>1</sup> Unclassifiable or attainment effective October 18, 2000, for the 1-hour ozone standard which was revoked effective June 15, 2005. Basic nonattainment designation effective federally April 5, 2005, for PM <sub>2.5</sub> .	

- (a) Ozone Standards

Volatile organic compounds (VOC) and nitrogen oxides (NO<sub>x</sub>) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NO<sub>x</sub> emissions are considered when evaluating the rule applicability relating to ozone. Dubois County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NO<sub>x</sub> emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

- (b) PM<sub>2.5</sub>  
 Dubois County has been classified as nonattainment for PM<sub>2.5</sub> in 70 FR 943 dated January 5, 2005. On May 8, 2008, U.S. EPA promulgated specific New Source Review rules for PM<sub>2.5</sub> emissions. These rules became effective on July 15, 2008. Therefore, direct PM<sub>2.5</sub> and SO<sub>2</sub> emissions were reviewed pursuant to the requirements of Nonattainment New Source Review, 326 IAC 2-1.1-5. See the State Rule Applicability – Entire Source section.
- (c) Other Criteria Pollutants  
 Dubois County has been classified as attainment or unclassifiable in Indiana for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

**Fugitive Emissions**

Since this type of operation is not one (1) of the twenty-eight (28) listed source categories under 326 IAC 2-2, or 326 IAC 2-7, and there is no applicable New Source Performance Standard that was in effect on August 7, 1980, fugitive emissions are not counted toward the determination of PSD and Part 70 Permit applicability.

**Unrestricted Potential Emissions**

This table reflects the unrestricted potential emissions of the source.

Unrestricted Potential Emissions	
Pollutant	Tons/year
PM	138.3
PM <sub>10</sub>	138.3
PM <sub>2.5</sub>	138.3
SO <sub>2</sub>	<0.1
VOC	1507.5
CO	7.7
NO <sub>x</sub>	9.1

HAPs	tons/year
toluene	442.3
xylene	77.0
MIBK	28.1
formaldehyde	28.1
<b>Total HAPs</b>	<b>575.5</b>

- (a) The potential to emit (as defined in 326 IAC 2-7-1(29)) of VOC, PM<sub>10</sub> and PM<sub>2.5</sub> is equal to or greater than 100 tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-7 and will be issued a Part 70 Operating Permit Renewal.
- (b) The potential to emit (as defined in 326 IAC 2-7-1(29)) of any single HAP is equal to or greater 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 equal to or greater than twenty-five (25) tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-7.

**Part 70 Permit Conditions**

This source is subject to the requirements of 326 IAC 2-7, because the source met the following:

- (a) Emission limitations and standards, including those operational requirements and limitations that assure compliance with all applicable requirements at the time of issuance of Part 70 permits.

- (b) Monitoring and related record keeping requirements which assume that all reasonable information is provided to evaluate continuous compliance with the applicable requirements.

**Potential to Emit After Issuance**

The table below summarizes the potential to emit, reflecting all limits, of the emission units. Any control equipment is considered federally enforceable only after issuance of this Part 70 permit renewal, and only to the extent that the effect of the control equipment is made practically enforceable in the permit.

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Renewal (tons/year)								
	PM	PM <sub>10</sub> *	PM <sub>2.5</sub>	SO <sub>2</sub>	NO <sub>x</sub>	VOC	CO	Total HAPs	Worst Single HAP
Surface Coating Operations	8.47	8.47	8.47	-	-	Less than 249	-	Greater than 25	Greater than 10 (toluene)
Woodworking Operations (EU 14)	45.1	4.51	4.51	-	-	-	-	-	-
Sanding Booths (EU 15 and EU 32)	50.27	45.61	45.61	-	-	-	-	-	-
Natural Gas Combustion	0.69	0.69	0.69	0.05	9.10	0.5	7.65	negl	negl
<b>Total PTE of Entire Source</b>	<b>104.5</b>	<b>59.28</b>	<b>59.28</b>	<b>0.05</b>	<b>9.10</b>	<b>Less than 250</b>	<b>7.65</b>	<b>Greater than 25</b>	<b>Greater than 10</b>
Title V Major Source Thresholds	NA	100	100	100	100	100	100	25	10
PSD Major Source Thresholds	250	250	NA	250	250	250	250	NA	NA
Emission Offset/ Nonattainment NSR Major Source Thresholds	NA	NA	100	NA	NA	NA	NA	NA	NA

negl. = negligible, emissions less than 0.1 tons/yr  
 "-" denotes process does not emit the designated pollutant  
 \*Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM<sub>10</sub>), not particulate matter (PM), is considered as a "regulated air pollutant".

- (a) This existing stationary source is not major for PSD because the emissions of each regulated pollutant are less than two hundred fifty (<250) tons per year, and it is not in one of the twenty-eight (28) listed source categories.
- (b) This existing stationary source is not major for Emission Offset and Nonattainment NSR because the emissions of the nonattainment pollutant, PM<sub>2.5</sub>, are less than one hundred (<100) tons per year.

**Federal Rule Applicability**

- (a) Pursuant to 40 CFR 64.2, Compliance Assurance Monitoring (CAM) is applicable to each existing pollutant-specific emission unit that meets the following criteria:

- (1) has a potential to emit before controls equal to or greater than the major source threshold for the pollutant involved;
- (2) is subject to an emission limitation or standard for that pollutant; and
- (3) uses a control device, as defined in 40 CFR 64.1, to comply with that emission limitation or standard.

The following table is used to identify the applicability of each of the criteria, under 40 CFR 64.1, to each existing emission unit and specified pollutant subject to CAM:

Emission Unit / Pollutant	Control Device Used	Emission Limitation (Y/N)	Uncontrolled PTE (tons/year)	Controlled PTE (tons/year)	Major Source Threshold (tons/year)	CAM Applicable (Y/N)	Large Unit (Y/N)
Woodworking EU 14/PM	baghouse	Y	225.3	45.1	100	Y	N
Final Sanding Booth EU 32/PM	baghouse	Y	225.3	45.1	100	Y	N
Spray booth EU 21/PM	dry filter	Y	6.11	1.22	100	N	N
Spray booth EU 22/PM	dry filter	Y	6.11	1.22	100	N	N
Spray booth EU 23/PM	dry filter	Y	6.11	1.22	100	N	N
Spray booth EU 25/PM	dry filter	Y	6.11	1.22	100	N	N
Spray booth EU 27/PM	dry filter	Y	17.90	3.58	100	N	N

Based on this evaluation, the requirements of 40 CFR Part 64, CAM are applicable to the woodworking facilities and the final sanding booth for particulate matter upon issuance of the Title V Renewal. A CAM plan will be incorporated into this Part 70 permit renewal. There is no control device for paint booth emissions of VOC; therefore, CAM is not applicable to the paint booths for VOC.

- (b) The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not subject to the requirements of the New Source Performance Standard, 40 CFR 60, Subpart D – Standards of Performance for Fossil-Fuel-Fired Steam Generating Units for Which Construction is Commenced After August 17, 1971 (326 IAC 12) because this boiler has a maximum heat input capacity less than 250 MMBtu per hour.
- (c) The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not subject to the requirements of the New Source Performance Standard, 40 CFR 60, Subpart Da - Standards of Performance for Electric Utility Steam Generating Units for Which Construction is Commenced After September 18, 1978 (326 IAC 12) because this boiler has a maximum heat input capacity less than 250 MMBtu per hour.
- (d) The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not subject to the requirements of the New Source Performance Standard, 40 CFR 60, Subpart Db – Standards of Performance for Industrial-Commercial-Institutional Steam Generating Units (326 IAC 12) because this boiler has a maximum heat input capacity less than 100 MMBtu per hour.

- (e) The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not subject to the requirements of the New Source Performance Standard, 40 CFR 60, Subpart Dc Standards of Performance for Industrial-Commercial-Institutional Steam Generating Units (326 IAC 12) because this boiler has a maximum heat input capacity less than 10 MMBtu per hour.

There are no other New Source Performance Standards (NSPS) (326 IAC 12 and 40 CFR Part 60) included in this permit.

- (f) The wood furniture surface coating operations (surface coating line 1 and surface coating line 2) are subject to the National Emission Standards for Hazardous Air Pollutants for Wood Furniture Manufacturing Operations (40 CFR 63.800 Subpart JJ), which is incorporated by reference as 326 IAC 20-14, because the source is a major source of HAPs and it is engaged in the manufacture of wood furniture or wood furniture components. The compliance date for this existing affected source is November 21, 1997. The units subject to this rule include the following:

- (1) surface coating line 1 spray booths EU 01 through EU 12
- (2) surface coating line 2 spray booths EU 21, EU 22, EU 23, EU 25, EU 27, EU 29, and EU 30

Pursuant to 40 CFR 63.804, the Permittee shall comply with the requirements of 40 CFR 63, Subpart JJ using any of the compliance options listed in 40 CFR 63, Subpart JJ, with the exception of using an add-on control device. The Permittee wants to retain the flexibility to use all of the compliance options within the MACT. The MACT allows the source to switch between compliance options.

The existing affected source is subject to the following portions of 40 CFR 63, Subpart JJ:

- (1) 40 CFR 63.800
- (2) 40 CFR 63.801
- (3) 40 CFR 63.802(a)(1)
- (4) 40 CFR 63.802(a)(2)
- (5) 40 CFR 63.802(a)(3)
- (6) 40 CFR 63.803
- (7) 40 CFR 63.804(a)(1),(2), and (4)
- (8) 40 CFR 63.804(b)
- (9) 40 CFR 63.804(c)(1)
- (10) 40 CFR 63.804(g)(1), (2), (5), (7), and (8)
- (11) 40 CFR 63.806(a), (b), (c), (e), (h), (i), and (j)
- (12) 40 CFR 63.807(a), (c), and (e)
- (13) 40 CFR 63.808
- (14) Table 1

The provisions of 40 CFR 63 Subpart A – General Provisions, which are incorporated as 326 IAC 20-14, apply to the wood furniture surface coating operations described in this section except when otherwise specified in 40 CFR 63, Subpart JJ.

<b>State Rule Applicability - Entire Source</b>
---

326 IAC 2-2 (Prevention of Significant Deterioration (PSD))  
Pursuant to SPM No. 037-10817-000012, issued on June 29, 1999, the source shall limit the use of VOC to less than 249 tons per year, thereby ensuring a minor source status under PSD. The source was modified in 2000 to add a second surface coating operation at the plant site and the potential to emit of VOC after this modification was limited by the PSD minor limit for VOC as follows:

- (a) The use of VOC, including coatings, dilution solvents, and cleaning solvents shall be less than 249 tons per twelve (12) consecutive month period with compliance determined at the end of each month. This usage limit is required to limit the source wide potential to emit of VOC to less than 250 tons per twelve (12) consecutive month period. Compliance with this limit ensures a minor source status under 326 IAC 2-2 (PSD).

326 IAC 2-1.1-5 (Nonattainment New Source Review)

This source is located in Dubois County which is a nonattainment area for PM<sub>2.5</sub>. The potential to emit of particulate is less than one hundred (100) tons per year. Therefore, this source is a minor source under 326 IAC 2-1.1-5, Nonattainment NSR.

326 IAC 2-4.1 (Hazardous Air Pollutants)

This source is not subject to the provisions of 326 IAC 2-4.1 because the surface coating operations are specifically regulated by the National Emission Standards for Hazardous Air Pollutants for Wood Furniture Manufacturing Operations (40 CFR Part 63, Subpart JJ), which was promulgated on December 7, 1995. Therefore, pursuant to 326 IAC 2-4.1-1(b)(2), this wood furniture manufacturing source is exempt from the requirements of 326 IAC 2-4.1.

326 IAC 2-6 (Emission Reporting)

This source, not located in Lake, Porter, or LaPorte County, is subject to 326 IAC 2-6 (Emission Reporting) because it is required to have an operating permit pursuant to 326 IAC 2-7 (Part 70). The potential to emit of VOC and PM<sub>10</sub> is less than 250 tons per year; and the potential to emit of CO, NO<sub>x</sub>, and SO<sub>2</sub> is less than 2,500 tons per year. Therefore, pursuant to 326 IAC 2-6-3(a)(2), triennial reporting is required. An emission statement shall be submitted in accordance with the compliance schedule in 326 IAC 2-6-3 by July 1, 2012, and every three (3) years thereafter. The emission statement shall contain, at a minimum, the information specified in 326 IAC 2-6-4.

326 IAC 5-1 (Opacity Limitations)

The source is located in Bainbridge Township of Dubois County. Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-1 (Applicability) and 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

- (a) Opacity shall not exceed an average of 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.

<b>State Rule Applicability - Surface Coating Operations</b>
--

326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes)

The surface coating operations is not subject to the requirements of 326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes) because it is located in Dubois County and is subject to the provisions of 326 IAC 6.5-1-2.

326 IAC 6.5-1-1 (Particulate Matter Limitations Except Lake County)

The surface coating operations are subject to the requirements of 326 IAC 6.5-1 because the source is located in Dubois County, has the potential to emit greater than 100 tons per year of particulate matter and is not specifically listed under 326 IAC 6.5-4. Therefore, pursuant to 326 IAC 6.5-1-2(a) (Particulate Matter Limitations Except Lake County), the surface coating operations shall not allow or permit discharge to the atmosphere of any gases which contain particulate matter in excess of three hundredths (0.03) grain per dry standard cubic feet.

Particulate from the surface coating operations shall be controlled by a dry particulate filter, and the Permittee shall operate the control device in accordance with manufacturer's specifications.

326 IAC 8-2-12 (Wood Furniture and Cabinet Coating)

- (a) The one (1) black enamel booth (EU 11) of surface coating line 1 and the entire surface coating line 2 operations (EU 21, EU 21, EU 23, EU 25, EU 27, EU 29, and EU 30) are subject to the requirements of 326 IAC 8-2-12 because they were constructed after July 1, 1990, and have actual VOC emissions greater than fifteen (15) pounds per day before add-on controls. Pursuant to 326 IAC 8-2-12 (Wood Furniture and Cabinet Coating), with the exception of no more than ten (10) gallons of coating per day used for touch-up and repair operations, the one (1) black enamel booth (EU 11) of the first surface coating line and the entire surface coating line 2 operations (EU 21, EU 21, EU 23, EU 25, EU 27, EU 29, and EU 30), applying coating to wood furniture shall utilize one (1) of the following application methods:

Airless Spray Application  
Air Assisted Airless Spray Application  
Electrostatic Spray Application  
Electrostatic Bell or Disc Application  
Heated Airless Spray Application  
Roller Coating Brush or Wipe Application  
Dip-and-Drain Application

High Volume Low Pressure (HVLP) Spray Application is an accepted alternative method of application for Air Assisted Airless Spray Application. HVLP spray is the technology used to apply coating to substrate by means of coating application equipment which operates between one-tenth (0.1) and ten (10) pounds per square inch gauge (psig) air pressure measured dynamically at the center of the air cap and at the air horns of the spray system.

- (b) Spray booths EU 01 through EU 10, and booth EU 12 are not subject to the requirements of 326 IAC 8-2-12 because these booths were constructed prior to January 1, 1980.

326 IAC 8-6 (Organic Solvent Emission Limitations)

This source is not subject to the requirements of 326 IAC 8-6 (Organic Solvent Emission Limitation) because it is located in Dubois County and is subject to the provisions of 326 IAC 8-2-12 (Wood Furniture and Cabinet Coating).

326 IAC 8-11-1 (Wood Furniture Coating)

This source is not subject to 326 IAC 8-11 because the source is located in Dubois County, and this rule applies only to sources located in Lake, Porter, Clark or Floyd Counties.

<b>State Rule Applicability – Boiler EU 13</b>
--

326 IAC 6-2 (Particulate Matter for Sources of Indirect Heating)

The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not subject to the requirements of 326 IAC 6-2-4 (Particulate Matter for Sources of Indirect Heating) because, pursuant to 326 IAC 6-2-1(e), the limitations contained in 326 IAC 6.5 and 326 IAC 6.8 prevail if any limitation established by 326 IAC 6-2 is inconsistent with the applicable limitations contained in 326 IAC 6.5 and 326 IAC 6.8.

326 IAC 6.5-1-1 (Particulate Matter Limitations Except Lake County)

The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 13) is not specifically listed in 326 IAC 6.5-4. Therefore, the 2.60 MMBtu per hour natural gas-fired boiler (EU 13) is subject to

the requirements of 326 IAC 6.5-1-2(b)(3), according to which the particulate matter emissions from the boiler shall not exceed one-hundredth (0.01) grain per dry standard cubic foot.

326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County)

The 2.60 MMBtu per hour natural gas-fired boiler (identified as EU 013) is not subject to the requirements of 326 IAC 6.5-4 because this source is not specifically listed in the rule.

#### **State Rule Applicability – Natural Gas-Fired Drying Ovens**

326 IAC 6.5-1 (Particulate Matter Limitations Except Lake County)

The three (3) natural gas-fired drying ovens (identified as EU 26, EU 28, and EU 31) are not specifically listed in 326 IAC 6.5-4, therefore, these ovens are subject to the requirements of 326 IAC 6.5-1-2(a). The particulate matter emissions from the three (3) drying ovens (identified as EU 26, EU 28, and EU 31) shall not exceed three-hundredths (0.03) grain per dry standard cubic foot each.

326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County)

The three (3) natural gas-fired drying ovens (identified as EU 26, EU 28, and EU 31) are not subject to the requirements of 326 IAC 6.5-4 because these ovens are not specifically listed in the rule.

#### **State Rule Applicability – Final Touch-up Sanding Booth**

326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes)

The final touch-up sanding booth is not subject to the requirements of 326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes) because it is located in Dubois County and is subject to the provisions of 326 IAC 6.5-1-2.

326 IAC 6.5-1 (Particulate Matter Limitations Except Lake County)

The final touch-up sanding booth (identified as EU 32) is not specifically listed in 326 IAC 6.5-4; therefore, the final touch-up sanding booth (identified as EU 32) is subject to the requirements of 326 IAC 6.5-1-2(a) (Particulate Matter Limitations Except Lake County). The particulate matter emissions from the final touch-up sanding booth (identified as EU 32) shall not exceed three-hundredths (0.03) grain per dry standard cubic foot.

326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County)

The final touch-up sanding booth (identified as EU 32) is not subject to the requirements of 326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County) because this unit is not specifically listed in the rule.

#### **State Rule Applicability – Insignificant Woodworking Operations and Repair Sanding Booth**

326 IAC 2-7-1(21)(G)(xxix) (Baghouse Limitations)

The woodworking operations and repair sanding booth, each controlled by a baghouse, are classified as insignificant under 326 IAC 2-7-1(21)(G)(xxix) and shall meet the following requirements.

- (a) The baghouse shall not exhaust to the atmosphere greater than one hundred twenty-five thousand (125,000) cubic feet of air per minute and shall not emit particulate matter with a diameter less than ten (10) microns ( $PM_{10}$ ) in excess of three-thousandths (0.003) grain per dry standard cubic foot of outlet air.
- (b) The opacity from the baghouse shall not exceed ten percent (10%).

- (c) Visible emissions from the baghouse shall be observed daily using procedures in accordance with Method 22 and normal or abnormal emissions are recorded.
- (d) In the event abnormal emissions are observed for greater than six (6) minutes in duration, the baghouse shall be inspected, and corrective actions, such as replacing or reseating bags, shall be initiated when necessary.

**326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes)**

The final touch-up sanding booth is not subject to the requirements of 326 IAC 6-3-2 (Particulate Matter Emission Limitations for Manufacturing Processes) because it is located in Dubois County and is subject to the provisions of 326 IAC 6.5-1-2.

**326 IAC 6.5-1 (Particulate Matter Limitations Except Lake County)**

The woodworking operations are not specifically listed in 326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County). Pursuant to 326 IAC 6.5-1-2(a), particulate emissions for sources that have potential to emit one hundred (100) tons or more or have actual emissions of ten (10) tons or more of particulate matter per year, and that are not limited by sections 326 IAC 6.5-1-2(b), (e), (f) or (g), shall not exceed 0.03 grain per dry standard cubic foot (dscf). Therefore, the particulate emissions from woodworking operations shall not exceed 0.03 grain per dry standard cubic foot (dscf).

**326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County)**

The woodworking operations and repair sanding booth are not subject to the requirements of 326 IAC 6.5-4 (Particulate Matter Limitations for Dubois County) because these facilities are not specifically listed in the rule.

<b>Testing Requirements</b>
-----------------------------

There are no testing requirements included in the permit. However, IDEM may require testing at any time to determine if the facilities are in compliance with the emissions limitations contained in 326 IAC 5-1, 326 IAC 6.5, or 326 IAC 2-2.

<b>Compliance Determination and Monitoring Requirements</b>
---

Permits issued under 326 IAC 2-7 are required to ensure that sources can demonstrate compliance with all applicable state and federal rules on a continuous basis. All state and federal rules contain compliance provisions; however, these provisions do not always fulfill the requirement for a continuous demonstration. When this occurs, IDEM, OAQ, in conjunction with the source, must develop specific conditions to satisfy 326 IAC 2-7-5. As a result, Compliance Determination Requirements are included in the permit. The Compliance Determination Requirements in Section D of the permit are those conditions that are found directly within state and federal rules and the violation of which serves as grounds for enforcement action.

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

- (a) The woodworking operations (EU 14) have applicable compliance monitoring conditions as specified below:
  - (1) Visible emission notations of the woodworking operations:

- (A) Daily visible emission notations of the woodworking facility stack exhaust (stack N) shall be performed during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.
  - (B) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
  - (C) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to 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 a reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.
- (2) An inspection shall be performed each calendar quarter of all bags controlling the woodworking facilities when venting to the atmosphere. A baghouse inspection shall be performed within three months of redirecting vents to the atmosphere and every three months thereafter. Inspections are optional when venting to the indoors. Inspections required by this condition shall not be performed in consecutive months. All defective bags shall be replaced.
- (3) 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 emissions 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 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.

These monitoring conditions are necessary because the baghouse must operate properly to ensure compliance with 326 IAC 2-7-1(21)(G)(xxix), 326 IAC 6.5-1, and 40 CFR 64.2 (Compliance Assurance Monitoring (CAM)).

- (b) The final touch-up sanding booth (EU 32) has applicable compliance monitoring conditions as specified below:
- (1) Visible emission notations of the final touch-up sanding booth operations:
    - (A) Daily visible emission notations of the final touch-up sanding booth stack exhaust shall be performed during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.
    - (B) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
    - (C) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to 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 a reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.
  - (2) The Permittee shall record the pressure drop across the baghouse used in conjunction with the final touch-up sanding booth, at least once per day when the process is in operation when venting to the atmosphere. When for any one (1) reading, the pressure drop across the baghouse is outside the normal range of 2.0 and 8.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

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

These monitoring conditions are necessary because the final touch-up sanding baghouse must operate properly to ensure compliance with 326 IAC 6.5-1 and 40 CFR 64.2 (Compliance Assurance Monitoring (CAM)).

- (c) The repair sanding booth (EU 15) has applicable compliance monitoring conditions as specified below:
- (1) Visible emission notations of the repair sanding booth operations:
    - (A) Daily visible emission notations of the repair sanding booth stack exhaust shall be performed during normal daylight operations when exhausting to the atmosphere. A trained employee shall record whether emissions are normal or abnormal.
    - (B) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.
    - (C) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to 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 a reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee’s obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.
  - (2) The Permittee shall record the pressure drop across the cartridge filter baghouse used in conjunction with the repair sanding booth, at least once per day when the process is in operation when venting to the atmosphere. When for any one (1) reading, the pressure drop across the baghouse is outside the normal range of 2.0 and 8.0 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response. Section C – Response to Excursions and Exceedances contains the Permittee’s obligation with regard to the reasonable response steps required by this condition. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

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

(3) 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 emissions 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 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.

These monitoring conditions are necessary because the repair sanding booth cartridge filter baghouse must operate properly to ensure compliance with 326 IAC 6.5-1.

- (d) The surface coating operations has applicable compliance monitoring conditions as specified below:
  - (1) Daily inspections shall be performed to verify the placement, integrity and particle loading of the filters. To monitor the performance of the dry filters, weekly observations shall be made of the overspray from the surface coating booth stacks (stacks 2A, 2B, 2C, 2F, 2H, 2J, and K) while one or more of the booths are in operation. If a condition exists which should result in a response step, the Permittee shall take a reasonable response step. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.
  - (2) Monthly inspections shall be performed of the coating emissions from each stack and the presence of overspray on the rooftops and the nearby ground. When there is a noticeable change in overspray emissions, or when evidence of overspray emissions is observed, the Permittee shall take reasonable response steps. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

These monitoring conditions are necessary because the dry filters for the surface coating operations must operate properly to ensure compliance with 326 IAC 6.5-1.

<b>Recommendation</b>
-----------------------

The staff recommends to the Commissioner that the Part 70 Operating Permit 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 January 20, 2010. Additional information was received on August 3, 2010.

<b>Conclusion</b>
-------------------

The operation of this stationary wood furniture manufacturing plant shall be subject to the conditions of the attached Part 70 Operating Permit Renewal No.T037-29306-00012.

<b>IDEM Contact</b>
---------------------

- (a) Questions regarding this proposed permit can be directed to Donald McQuigg at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 234-4240 or toll free at 1-800-451-6027 extension 4-4240.
- (b) A copy of the findings is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>.
- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM's Guide for Citizen Participation and Permit Guide on the Internet at: [www.idem.in.gov](http://www.idem.in.gov).

**Appendix A: Emissions Calculations**  
**Potential Particulate Emissions from Woodworking Operations and Sanding**

**Company Name:** Inwood Office Furniture Co., Inc.  
**Address:** 1108 East 15th Street, Jasper, Indiana 47546  
**Part 70 Permit No.:** T037-29306-00012  
**Permit Reviewer:** Donald McQuigg  
**Date:** July 7, 2010

Uncontrolled Potential Particulate Emissions					
Unit Operations	Air Flow Rate Baghouse (acfm)	Baghouse Outlet Grain Loading (gr/dscf)	Baghouse Efficiency (%)	Potential PM/PM <sub>10</sub> Emissions (lbs/hr)	Potential PM/PM <sub>10</sub> Emissions (tons/yr)
Wood Working Shop (EU 14)	40,000	0.003	0.98	1.0	225.3
Final Touch-Up Sanding Booth (EU 32)	40,000	0.003	0.98	1.0	225.3
Repair Sanding Booth (EU 15)	4,500	0.003	0.99	0.12	50.7

**METHODOLOGY**

Potential uncontrolled emissions (tons/year)=outlet grain loading (gr/dscf)\*air flow(acfm)\*(60min/hr)\*(1 lb/7000 gr)\*(1/(1-control efficiency))\*8760 hours/year\*1 ton/2000 lbs

Limited Potential Particulate Emissions							
Unit Operations	Air Flow Rate Baghouse (acfm)	326 IAC 6.5-1-2(a) PM Limitation (gr/dscf)	326 IAC 2-7-1(21)(G)(xxix) PM <sub>10</sub> Limitation (gr/dscf)	Equivalent PM Limit		Equivalent PM <sub>10</sub> Limit	
				(lbs/hour)	(tons/year)	(lbs/hour)	(tons/year)
Wood Working Shop (EU 14)	40,000	0.03	0.003	10.3	45.1	1.0	4.5
Final Touch-Up Sanding Booth (EU 32)	40,000	0.03	-	10.3	45.1	-	-
Repair Sanding Booth (EU 15)	4,500	0.03	0.003	1.2	5.1	0.12	0.51

**METHODOLOGY**

Equivalent Particulate Limit (lbs/hour) = Air Flow Rate (acfm) \* Grains/dscf \* 60 minutes/hour \* 1 lb/7000 grains

Equivalent Particulate Limit (tons/year) = Air Flow Rate (acfm) \* Grains/dscf \* 60 minutes/hour \* 1 lb/7000 grains \* 8760 hours/year \* 1 ton/2000 lbs

**Appendix A: Emission Calculations  
Natural Gas Combustion Only  
MMBtu/hr < 100**

**Company Name:** Inwood Office Furniture Co., Inc.  
**Address:** 1108 East 15th Street, Jasper, Indiana 47546  
**Part 70 Permit No.:** T037-29306-00012  
**Permit Reviewer:** Donald McQuigg  
**Date:** July 7, 2010

**Heat Input Capacity**  
(MMBtu/hour)

21.2

**Potential Throughput**  
(MMSCF/year)

182

<b>Emission Factor (lb/MMSCF)</b>	<b>* PM</b> 7.6	<b>* PM10</b> 7.6	<b>SO<sub>2</sub></b> 0.6	<b>** NO<sub>x</sub></b> 100	<b>VOC</b> 5.5	<b>CO</b> 84
<b>Potential To Emit (tons/year)</b>	0.69	0.69	0.05	9.10	0.50	7.65

\*PM and PM10 emission factors are filterable and condensable PM and PM10 combined.

\*\* Emission factor for NOx (Uncontrolled) = 100 lb/MMSCF.

Emission factors are from AP-42, Chapter 1.4, Tables 1.4-1 and 1.4-2, SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03 (July, 1998).

All emission factors are based on normal firing.

**METHODOLOGY**

Potential Throughput (MMSCF/year) = Heat Input Capacity (MMBtu/hour) \* 8760 hours/year \* 1 MMSCF/1020 MMBtu

Potential To Emit (tons/year) = Potential Throughput (MMSCF/year) \* Emission Factor (lb/MMSCF) \* 1 ton/2000 lbs

See next page for HAPs emissions calculations.

**Appendix A: Emission Calculations**  
**Natural Gas Combustion Only**  
**MMBtu/hr < 100**

**Company Name:** Inwood Office Furniture Co., Inc.  
**Address:** 1108 East 15th Street, Jasper, Indiana 47546  
**Part 70 Permit No.:** T037-29306-00012  
**Permit Reviewer:** Donald McQuigg  
**Date:** July 7, 2010

**HAPs - Organics**

	<b>Benzene</b>	<b>Dichlorobenzene</b>	<b>Formaldehyde</b>	<b>Hexane</b>	<b>Toluene</b>
<b>Emission Factor (lb/MMSCF)</b>	2.1E-03	1.2E-03	7.5E-02	1.8E+00	3.4E-03
<b>Potential To Emit (tons/year)</b>	1.91E-04	1.09E-04	6.83E-03	1.64E-01	3.10E-04

**HAPs - Metals**

	<b>Lead</b>	<b>Cadmium</b>	<b>Chromium</b>	<b>Manganese</b>	<b>Nickel</b>
<b>Emission Factor (lb/MMSCF)</b>	5.0E-04	1.1E-03	1.4E-03	3.8E-04	2.1E-03
<b>Potential To Emit (tons/year)</b>	4.55E-05	1.00E-04	1.27E-04	3.46E-05	1.91E-04

Methodology is the same as previous page.

The five highest organic and metal HAPs emission factors provided above are from AP-42, Chapter 1.4, Table 1.4-3 and 1.4-4 (July, 1998).  
 Additional HAPs emission factors are available in AP-42, Chapter 1.4.

**Appendix A: Emissions Calculations  
Potential VOC, HAP, and PM Emissions from Surface Coating Operations**

Company Name: Inwood Office Furniture Co., Inc.  
Address: 1108 East 15th Street, Jasper, Indiana 47546  
Part 70 Permit No.: T037-29306-00012  
Permit Reviewer: Donald McQuigg  
Date: July 7, 2010

Process I.D.	Material Used	Density (lbs/gal)	Weight % Volatiles (H <sub>2</sub> O+Organics)	Weight % Water	Volume % Water	Volume % Non-volatiles (Solids)	Coating Ratio	Lbs VOC per Gallon as Applied	Lbs Solids per Gallon as Applied	Max. Usage (gal/unit)	Max. Throughput (units/hour)	Unlimited PTE of VOC (tons/year)	Uncontrolled PTE of PM/PM10 (tons/year)	Method	Controlled PTE of PM/PM10 (tons/year)			
EU21	Crown Cherry Durostain	6.95	96.05%	0	0	1.36	100%	6.68	0.27	0.308	30	270	6.11	(1)	1.22			
EU22	Crown Cherry Durostain	6.95	96.05%	0	0	1.36	100%	6.68	0.27	0.308	30	270	6.11	(1)	1.22			
EU23	Crown Cherry Durostain	6.95	96.05%	0	0	1.36	100%	6.68	0.27	0.308	30	270	6.11	(1)	1.22			
EU24	#1 Walnut Wipe Stain	6.73	86.50%	0	0	7.7	61.54%	6.46	0.56	0.124	30	105	0.00	(2)	0.00			
EU24	Reducer	7.47	100.00%	0	0	0	38.46%	-	-	-	-	-	-	-	-			
EU25	Crown Cherry Durostain	6.95	96.05%	0	0	1.36	100%	6.68	0.27	0.308	30	270	6.11	(1)	1.22			
EU27	H.S. Catalyst Sealer	7.5	76.81%	0	0	16.63	98.20%	5.80	1.71	0.145	30	110	17.90	(1)	3.58			
EU27	Retarder	7.86	100.00%	0	0	0	1.80%	-	-	-	-	-	-	-	-			
EU29	#1 Walnut Wipe Stain	6.73	86.50%	0	0	7.7	61.54%	6.46	0.56	0.124	30	105	0.00	(2)	0.00			
EU29	Reducer	7.47	100.00%	0	0	0	38.46%	-	-	-	-	-	-	-	-			
EU30	#1 Walnut Wipe Stain	6.73	86.50%	0	0	7.7	61.54%	6.46	0.56	0.124	30	105	0.00	(2)	0.00			
EU30	Reducer	7.47	100.00%	0	0	0	38.46%	-	-	-	-	-	-	-	-			
		Calc Method #1	Calc Method #2											<b>Totals</b>	<b>1507</b>	<b>42.3</b>		<b>8.47</b>
	Transfer Efficiency	45%	100%															
	Collection Efficiency	90%	NA															
	Control Efficiency	90%	NA															

Process I.D.	Material Used	Weight Percent HAPs				PTE of HAPs in tons per year			
		Xylene	MIBK	Formaldehyde	Toluene	Xylene	MIBK	Formaldehyde	Toluene
EU21	Crown Cherry Durostain	0.00%	0.00%	0.00%	40.9%	0.00	0.00	0.00	110.6
EU22	Crown Cherry Durostain	0.00%	0.00%	0.00%	40.9%	0.00	0.00	0.00	110.6
EU23	Crown Cherry Durostain	0.00%	0.00%	0.00%	40.9%	0.00	0.00	0.00	110.6
EU24	#1 Walnut Wipe Stain	17.3%	0.00%	0.00%	0.0%	18.2	0.00	0.00	0.0
EU24	Reducer	0.0%	0.00%	0.00%	0.0%	0.0	0.00	0.00	0.0
EU25	Crown Cherry Durostain	0.0%	0.00%	0.00%	40.9%	0.0	0.00	0.00	110.6
EU27	H.S. Catalyst Sealer	20.3%	25.4%	0.24%	0.00%	22.4	28.1	28.1	0.0
EU27	Retarder	0.0%	0.00%	0.00%	0.00%	0.0	0.00	0.00	0.0
EU29	#1 Walnut Wipe Stain	17.3%	0.00%	0.00%	0.00%	18.2	0.00	0.00	0.0
EU29	Reducer	0.0%	0.00%	0.00%	0.00%	0.0	0.00	0.00	0.0
EU30	#1 Walnut Wipe Stain	17.3%	0.00%	0.00%	0.00%	18.2	0.00	0.00	0.0
EU30	Reducer	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00	0.0
<b>Total Single HAPs PTE (tons/year)</b>						<b>77.0</b>	<b>28.1</b>	<b>28.1</b>	<b>442.3</b>
<b>Total Combined HAPs PTE (tons/year)</b>						<b>575</b>			

Assume all PM emissions are equal to PM10.  
The surface coating calculations are from SSM permit no.: 037-12168-00012 issued September 28, 2000.

**METHODOLOGY**

PTE of VOC (tons/year) = Pounds VOC per Gallon Coating \* Max. Usage (gal/unit) \* Max. Throughput (units/hour) \* 8760 hours/year \* 1 ton/2000 lbs  
PTE of PM/PM10 (tons/year) = Pounds Solids per Gallon Coating \* Max.Usage (gal/unit) \* Max. Throughput (units/hour) \* (1-Transfer Efficiency %) \* 8760 hours/year \* 1 ton/2000 lbs  
Controlled PTE of PM/PM10 (tons/year) = PTE of PM/PM10 (tons/year) \* [(1- Collection Efficiency %) + (1- Control Efficiency %)]  
PTE of HAP (tons/year) = PTE of VOC (tons/year) \* Weight % HAP



# INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

*We Protect Hoosiers and Our Environment.*

*Mitchell E. Daniels Jr.*  
**Governor**

*Thomas W. Easterly*  
**Commissioner**

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

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

**TO:** Chuck Divine  
Inwood Office Furniture Co., Inc  
1108 E. 15<sup>th</sup> St  
Jasper, IN 47546

**DATE:** February 4, 2011

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

**SUBJECT:** Final Decision  
Title V - Renewal  
037-29306-00012

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

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

A copy of the final decision and supporting materials has also been sent via standard mail to:  
Glen Strum (President)  
Jordan Eldridge (August Mack Environmental, Inc)  
OAQ Permits Branch Interested Parties List

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

Final Applicant Cover letter.dot 11/30/07



# INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

*We Protect Hoosiers and Our Environment.*

*Mitchell E. Daniels Jr.*  
**Governor**

*Thomas W. Easterly*  
**Commissioner**

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

February 4, 2011

TO: Jasper Public Library

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

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

**Applicant Name: Inwood Office Furniture Co., Inc**  
**Permit Number: 037-29306-00012**

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

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

Enclosures  
Final Library.dot 11/30/07

# Mail Code 61-53

IDEM Staff	MIDENNEY 2/4/2011 Inwood Office Furniture Co. Inc 037-29306-00012 (final)		Type of Mail:  <b>CERTIFICATE OF MAILING ONLY</b>	AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender		Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204		

Line	Article Number	Name, Address, Street and Post Office Address	Postage	Handing Charges	Act. Value (If Registered)	Insured Value	Due Send if COD	R.R. Fee	S.D. Fee	S.H. Fee	Rest. Del. Fee	Remarks
1		Chuck Divine Inwood Office Furniture Co, Inc 1108 E 15th St Jasper IN 47546 (Source CAATS) via confirmed delivery										
2		Glen Strum President Inwood Office Furniture Co, Inc 1108 E 15th St Jasper IN 47546 (RO CAATS)										
3		Mr. Wendell Hibdon Plumbers & Steam Fitters Union, Local 136 2300 St. Joe Industrial Park Dr Evansville IN 47720 (Affected Party)										
4		Dubois County Commissioners One Courthouse Square Jasper IN 47546 (Local Official)										
5		Jasper City Council and Mayors Office PO Box 29, 610 Main Jasper IN 47546 (Local Official)										
6		DuBois County Health Department 1187 S St. Charles Street Jasper IN 47546 (Health Department)										
7		Jasper Public Library 1116 Main Street Jasper IN 47546 (Library)										
8		Mr. John Blair 800 Adams Ave Evansville IN 47713 (Affected Party)										
9		Jordan Eldridge August Mack Environmental, Inc. 1302 N. Meridian Street Suite 300 Indianapolis IN 46202 (Consultant)										
10												
11												
12												
13												
14												
15												

Total number of pieces Listed by Sender  <b>8</b>	Total number of Pieces Received at Post Office	Postmaster, Per (Name of Receiving employee)	The full declaration of value is required on all domestic and international registered mail. The maximum indemnity payable for the reconstruction of nonnegotiable documents under Express Mail document reconstructing insurance is \$50,000 per piece subject to a limit of \$50, 000 per occurrence. The maximum indemnity payable on Express mil merchandise insurance is \$500. The maximum indemnity payable is \$25,000 for registered mail, sent with optional postal insurance. See <b>Domestic Mail Manual R900, S913, and S921</b> for limitations of coverage on inured and COD mail. See <b>International Mail Manual</b> for limitations o coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
---	--	--	--