



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

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

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

TO: Interested Parties / Applicant

DATE: August 13, 2013

RE: Southern Indiana Hardwoods, Inc./037-33274-00118

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

Notice of Decision: Approval - Effective Immediately

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

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

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

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

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

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

Enclosures
FNPER.dot 6/13/13



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Minor Source Operating Permit OFFICE OF AIR QUALITY

**Southern Indiana Hardwoods, Inc.
2739 S. St. Anthony Rd. W
Huntingburg, Indiana 47542**

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

This permit is issued to the above mentioned company under the provisions of 326 IAC 2-1.1, 326 IAC 2-5.1, 326 IAC 2-6.1 and 40 CFR 52.780, with conditions listed on the attached pages.

Indiana statutes from IC 13 and rules from 326 IAC, quoted in conditions in this permit, are those applicable at the time the permit was issued. The issuance or possession of this permit shall not alone constitute a defense against an alleged violation of any law, regulation or standard, except for the requirement to obtain a MSOP under 326 IAC 2-6.1.

Operation Permit No. M037-29151-00118	
Issued by: Original Signed by: Alfred C. Dumauval, Ph. D., Section Chief Permits Branch Office of Air Quality	Issuance Date: April 26, 2010 Expiration Date: April 26, 2015


First Significant Permit Revision No. 037-33274-00118	
Issued by:  Nathan C. Bell, Section Chief Permits Branch Office of Air Quality	Issuance Date: August 13, 2013 Expiration Date: April 26, 2015

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SECTION A

SOURCE SUMMARY

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 and A.2 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 2-5.1-3(c)][326 IAC 2-6.1-4(a)]

The Permittee owns and operates a stationary lumber and pallet cut stock milling operation.

Source Address:	2739 S. St. Anthony Rd. W, Huntingburg, Indiana 47542
General Source Phone Number:	(812) 326-2055
SIC Code:	2421, 2426, 2499
County Location:	Dubois
Source Location Status:	Attainment for all criteria pollutants
Source Status:	Minor Source Operating Permit Program Minor Source, under PSD and Emission Offset Rules Minor Source, Section 112 of the Clean Air Act Not 1 of 28 Source Categories

A.2 Emission Units and Pollution Control Equipment Summary

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

- (a) One (1) Main Sawmill, including:
- (1) One (1) debarker, constructed in 2000, approved for modification in 2013, with a maximum throughput of 18,500 pounds per hour, with particulate matter emissions uncontrolled;
 - (2) One (1) head saw, constructed in 2000, approved for modification in 2013, with a maximum throughput of 14,000 pounds per hour, with particulate matter emissions uncontrolled;
 - (3) One (1) three saw edger, constructed in 2000, approved for modification in 2013, with a maximum throughput of 5,000 pounds per hour, with particulate matter emissions uncontrolled; and
 - (4) One (1) three sided scrag mill, constructed in 2008, with a maximum production rate of 200 board feet per hour, with particulate matter emissions controlled by the Sawmill Cyclone.
- (b) One (1) Pallet Mill Cut Stock operation, constructed in 2000, approved for modification in 2013, with a maximum production rate of 500 board feet per hour, with particulate matter emissions controlled by the Pallet Mill Cyclone, including:
- (1) One (1) two headed band saw;
 - (2) One (1) pop up trim saw;
 - (3) One (1) cross cut saw;
 - (4) One (1) sizer; and

- (5) One (1) six head band saw.
- (c) One (1) Pelleting operation, constructed in 2009, approved for modification in 2013, with a maximum throughput of 7,000 pounds per hour, including:
 - (1) One (1) wood chipper, grinding wood scraps into chips, with a maximum throughput of 10,000 pounds per hour;
 - (2) One (1) wood chip storage pile and wood chip handling operation
 - (3) One (1) hammermill, grinding wood chips into wood fiber, with particulate matter emissions controlled by the Dryer Cyclone;
 - (4) One (1) bark fueled process heater, approved for construction in 2013, with a maximum heat input capacity of 15.0 MMBtu/hr, providing heat for the wood fiber drum dryer;
 - (5) One (1) wood fiber drum dryer;
 - (6) One (1) wood fiber storage silo;
 - (7) One (1) vegetable oil spraying unit;
 - (8) One (1) wood pellet extrusion and pellet breaking operation;
 - (9) One (1) wood pellet screening operation, with wood fines returned to the vegetable oil spraying unit for reprocessing, with particulate matter emissions controlled by the Dryer Cyclone;
 - (10) One (1) wood pellet storage bin; and
 - (11) One (1) wood pellet screening operation;
 - (12) One (1) wood pellet bagging operation.
- (d) One (1) propane-fired boiler, constructed in 1994, with a maximum heat input capacity of 1.568 MMBtu/hr, providing steam heat to the kilns;
- (e) Two (2) propane storage tanks, with a maximum storage capacity of 1,000 gallons, each;
- (f) One (1) HI-VAC dry kiln for wood drying;
- (g) One (1) conventional dry kiln for wood drying;
- (h) Lumber storage piles;
- (i) Stacking shed;
- (j) Loadout building; and
- (k) Unpaved roads.

SECTION B

GENERAL CONDITIONS

B.1 Definitions [326 IAC 2-1.1-1]

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 2-1.1-1) shall prevail.

B.2 Revocation of Permits [326 IAC 2-1.1-9(5)]

Pursuant to 326 IAC 2-1.1-9(5)(Revocation of Permits), the Commissioner may revoke this permit if construction is not commenced within eighteen (18) months after receipt of this approval or if construction is suspended for a continuous period of one (1) year or more.

B.3 Affidavit of Construction [326 IAC 2-5.1-3(h)] [326 IAC 2-5.1-4]

This document shall also become the approval to operate pursuant to 326 IAC 2-5.1-4 when prior to the start of operation, the following requirements are met:

- (a) The attached Affidavit of Construction shall be submitted to the Office of Air Quality (OAQ), verifying that the emission units were constructed as proposed in the application or the permit. The emission units covered in this permit may begin operating on the date the Affidavit of Construction is postmarked or hand delivered to IDEM if constructed as proposed.
- (b) If actual construction of the emission units differs from the construction proposed in the application, the source may not begin operation until the permit has been revised pursuant to 326 IAC 2 and an Operation Permit Validation Letter is issued.
- (c) The Permittee shall attach the Operation Permit Validation Letter received from the Office of Air Quality (OAQ) to this permit.

B.4 Permit Term [326 IAC 2-6.1-7(a)][326 IAC 2-1.1-9.5][IC 13-15-3-6(a)]

- (a) This permit, M037-29151-00118, 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, until the renewal permit has been issued or denied.

B.5 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.6 Enforceability

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.7 Severability

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.8 Property Rights or Exclusive Privilege

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

B.9 Duty to Provide Information

- (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.10 Annual Notification [326 IAC 2-6.1-5(a)(5)]

- (a) An annual notification shall be submitted by an authorized individual to the Office of Air Quality stating whether or not the source is in operation and in compliance with the terms and conditions contained in this permit.
- (b) The annual notice shall be submitted in the format attached no later than March 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
- (c) The notification 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.

B.11 Preventive Maintenance Plan [326 IAC 1-6-3]

- (a) If required by specific condition(s) in Section D of this permit, the Permittee shall prepare and maintain Preventive Maintenance Plans (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 Permittee shall implement the PMPs.

- (b) A copy of the PMPs shall be submitted to IDEM, OAQ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions.
- (c) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

B.12 Prior Permits Superseded [326 IAC 2-1.1-9.5]

- (a) All terms and conditions of permits established prior to M037-29151-00118 and issued pursuant to permitting programs approved into the state implementation plan have been either:
 - (1) incorporated as originally stated,
 - (2) revised, or
 - (3) deleted.
- (b) All previous registrations and permits are superseded by this permit.

B.13 Termination of Right to Operate [326 IAC 2-6.1-7(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 one hundred twenty (120) days prior to the date of expiration of the source's existing permit, consistent with 326 IAC 2-6.1-7.

B.14 Permit Renewal [326 IAC 2-6.1-7]

- (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 2-6.1-7. Such information shall be included in the application for each emission unit at this source. The renewal application does require an affirmation that the statements in the application are true and complete by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Request for renewal shall be submitted to:

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

- (b) A timely renewal application is one that is:
- (1) Submitted at least one hundred twenty (120) days 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 2-6.1 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 2-6.1-4(b), in writing by IDEM, OAQ any additional information identified as being needed to process the application.

B.15 Permit Amendment or Revision [326 IAC 2-5.1-3(e)(3)][326 IAC 2-6.1-6]

- (a) Permit amendments and revisions are governed by the requirements of 326 IAC 2-6.1-6 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
- (c) The Permittee shall notify the OAQ no later than thirty (30) calendar days of implementing a notice-only change. [326 IAC 2-6.1-6(d)]

B.16 Source Modification Requirement

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

B.17 Inspection and Entry

[326 IAC 2-5.1-3(e)(4)(B)][326 IAC 2-6.1-5(a)(4)][IC 13-14-2-2][IC 13-17-3-2][IC 13-30-3-1]

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

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

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

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

B.18 Transfer of Ownership or Operational Control [326 IAC 2-6.1-6]

- (a) The Permittee must comply with the requirements of 326 IAC 2-6.1-6 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

The application which shall be submitted by the Permittee does require an affirmation that the statements in the application are true and complete by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (c) The Permittee may implement notice-only changes addressed in the request for a notice-only change immediately upon submittal of the request. [326 IAC 2-6.1-6(d)(3)]

B.19 Annual Fee Payment [326 IAC 2-1.1-7]

- (a) The Permittee shall pay annual fees due no later than thirty (30) calendar days of receipt of a bill from IDEM, OAQ.
- (b) 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.20 Credible Evidence [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 2-6.1-5(a)(1)]

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

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

C.2 Permit Revocation [326 IAC 2-1.1-9]

Pursuant to 326 IAC 2-1.1-9 (Revocation of Permits), this permit to construct and operate may be revoked for any of the following causes:

- (a) Violation of any conditions of this permit.
- (b) Failure to disclose all the relevant facts, or misrepresentation in obtaining this permit.
- (c) Changes in regulatory requirements that mandate either a temporary or permanent reduction of discharge of contaminants. However, the amendment of appropriate sections of this permit shall not require revocation of this permit.
- (d) Noncompliance with orders issued pursuant to 326 IAC 1-5 (Episode Alert Levels) to reduce emissions during an air pollution episode.
- (e) For any cause which establishes in the judgment of IDEM, the fact that continuance of this permit is not consistent with purposes of this article.

C.3 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 forty percent (40%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

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

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

C.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.

- (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 2-6.1-5(a)(2)]

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.
- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date.
- (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 2-6.1-5(a)(2)]

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

Compliance with applicable requirements shall be documented as required by this permit. The Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. All monitoring and record keeping requirements not already legally required shall be implemented when operation begins.

C.11 Instrument Specifications [326 IAC 2-1.1-11]

- (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

C.12 Response to Excursions or Exceedances

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.13 Actions Related to Noncompliance Demonstrated by a Stack Test

- (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.

Record Keeping and Reporting Requirements [326 IAC 2-6.1-5(a)(2)]

C.14 Malfunctions Report [326 IAC 1-6-2]

Pursuant to 326 IAC 1-6-2 (Records; Notice of Malfunction):

- (a) A record of all malfunctions, including startups or shutdowns of any facility or emission control equipment, which result in violations of applicable air pollution control regulations or applicable emission limitations shall be kept and retained for a period of three (3) years and shall be made available to the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) or appointed representative upon request.
- (b) When a malfunction of any facility or emission control equipment occurs which lasts more than one (1) hour, said condition shall be reported to OAQ, using the Malfunction Report Forms (2 pages). Notification shall be made by telephone or facsimile, as soon as practicable, but in no event later than four (4) daytime business hours after the beginning of said occurrence.
- (c) Failure to report a malfunction of any emission control equipment shall constitute a violation of 326 IAC 1-6, and any other applicable rules. Information of the scope and expected duration of the malfunction shall be provided, including the items specified in 326 IAC 1-6-2(a)(1) through (6).
- (d) Malfunction is defined as any sudden, unavoidable failure of any air pollution control equipment, process, or combustion or process equipment to operate in a normal and usual manner. [326 IAC 1-2-39]

C.15 General Record Keeping Requirements [326 IAC 2-6.1-5]

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

C.16 General Reporting Requirements [326 IAC 2-1.1-11] [326 IAC 2-6.1-2] [IC 13-14-1-13]

- (a) Reports required by conditions in Section D of 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

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

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

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

- (a) One (1) Main Sawmill, including:
- (1) One (1) debarker, constructed in 2000, approved for modification in 2013, with a maximum throughput of 18,500 pounds per hour, with particulate matter emissions uncontrolled;
 - (2) One (1) head saw, constructed in 2000, approved for modification in 2013, with a maximum throughput of 14,000 pounds per hour, with particulate matter emissions uncontrolled;
 - (3) One (1) three saw edger, constructed in 2000, approved for modification in 2013, with a maximum throughput of 5,000 pounds per hour, with particulate matter emissions uncontrolled; and
 - (4) One (1) three sided scrag mill, constructed in 2008, with a maximum production rate of 200 board feet per hour, with particulate matter emissions controlled by the Sawmill Cyclone.
- (b) One (1) Pallet Mill Cut Stock operation, constructed in 2000, approved for modification in 2013, with a maximum production rate of 500 board feet per hour, with particulate matter emissions controlled by the Pallet Mill Cyclone, including:
- (1) One (1) two headed band saw;
 - (2) One (1) pop up trim saw;
 - (3) One (1) cross cut saw;
 - (4) One (1) sizer; and
 - (5) One (1) six head band saw.
- (c) One (1) Pelleting operation, constructed in 2009, approved for modification in 2013, with a maximum throughput of 7,000 pounds per hour, including:
- (1) One (1) wood chipper, grinding wood scraps into chips, with a maximum throughput of 10,000 pounds per hour;
 - (2) One (1) wood chip storage pile and wood chip handling operation
 - (3) One (1) hammermill, grinding wood chips into wood fiber, with particulate matter emissions controlled by the Dryer Cyclone;
 - (4) One (1) bark fueled process heater, approved for construction in 2013, with a maximum heat input capacity of 15.0 MMBtu/hr, providing heat for the wood fiber drum dryer;
 - (5) One (1) wood fiber drum dryer;
 - (6) One (1) wood fiber storage silo;

- (7) One (1) vegetable oil spraying unit;
 - (8) One (1) wood pellet extrusion and pellet breaking operation;
 - (9) One (1) wood pellet screening operation, with wood fines returned to the vegetable oil spraying unit for reprocessing, with particulate matter emissions controlled by the Dryer Cyclone;
 - (10) One (1) wood pellet storage bin; and
 - (11) One (1) wood pellet screening operation;
 - (12) One (1) wood pellet bagging operation.
- (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 2-6.1-5(a)(1)]

D.1.1 Particulate Matter (PM) Limitations [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2, the particulate matter (PM) from the woodworking operations shall not exceed the pound per hour limitations listed in the table below when operating at the specified process weight rate.

Emissions Unit	Process Weight Rate (tons/hr)	326 IAC 6-3-2 Allowable Particulate Emission Rate (lbs/hour)
Debarker	9.25	18.20
Head Saw	7	15.10
Three Saw Edger	2.5	7.58
Pelleting Operation	11.5	21.06
Three-Sided Scrag Mill	1.6	5.62
Pallet Mill Cut Stock Operation	7.2	15.39

The pound per hour limitations were calculated with the following equation:

Interpolation of the data for the process weight rate up to sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$$E = 4.10 P^{0.67} \quad \text{where } E = \text{rate of emission in pounds per hour and } P = \text{process weight rate in tons per hour}$$

D.1.2 PSD Minor Limitations [326 IAC 2-2]

In order to render the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration) not applicable, the PM, PM10, and PM2.5 emissions after control shall be less than the following emission limitations:

Emission Unit Description	Control Device	PM Emission Limit (lbs/hour)	PM10 Emission Limit (lbs/hour)	PM2.5 Emission Limit (lbs/hour)
Three-Sided Scrag Mill	Sawmill Cyclone	5.62	5.62	5.62
Pallet Mill Cut Stock Operation	Pallet Mill Cyclone	15.39	15.39	15.39

Compliance with these limits, combined with the potential to emit PM, PM10, and PM2.5 from all other emission units at this source, shall limit the source-wide total potential to emit of PM, PM10, and PM2.5 to less than 250 tons per year, each, and shall render 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) not applicable.

D.1.3 Preventive Maintenance Plan [326 IAC 1-6-3]

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

Compliance Determination Requirements

D.1.4 Particulate Control

In order to comply with Conditions D.1.1 and D.1.2, the Sawmill Cyclone shall be in operation at all times that the Three-Sided Scrag Mill is in operation and the Pallet Mill Cyclone shall be in operation at all times that the Pallet Mill Cut Stock Operation is in operation.

Compliance Monitoring Requirements [326 IAC 2-6.1-5(a)(2)]

D.1.5 Visible Emissions Notations

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

D.1.6 Cyclone Inspections

An inspection shall be performed each calendar quarter of the Saw Mill Cyclone and the Pallet Mill Cyclone. Inspections required by this condition shall not be performed in consecutive months.

D.1.7 Cyclone Failure Detection

In the event that cyclone failure has been observed:

Failed units and the associated process will be shut down immediately until the failed units have been repaired or replaced. 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 2-6.1-5(a)(2)]

D.1.8 Record Keeping Requirements

- (a) To document the compliance status with Condition D.1.5, the Permittee shall maintain records of daily visible emission notations of the Saw Mill Cyclone and the Pallet Mill Cyclone stack exhausts. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of visible emission notation (e.g., the process did not operate that day).
- (b) To document the compliance status with Condition D.1.6, the Permittee shall maintain records of the results of the inspections required under Conditions D.1.6.
- (c) Section C - General Record Keeping Requirements of this permit contains the Permittee's obligations with regard to the records required by this condition.

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

- (d) One (1) propane-fired boiler, constructed in 1994, with a maximum heat input capacity of 1.568 MMBtu/hr, providing steam heat to the kilns;

(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 2-6.1-5(a)(1)]

D.2.1 Particulate Matter (PM) Limitations [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4, the particulate matter emissions from the propane-fired boiler, constructed in 1994, with a maximum heat input capacity of 1.568 MMBtu/hr, shall not exceed 0.6 lb/MMBtu heat input.

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

**MINOR SOURCE OPERATING PERMIT
ANNUAL NOTIFICATION**

This form should be used to comply with the notification requirements under 326 IAC 2-6.1-5(a)(5).

Company Name:	Southern Indiana Hardwoods, Inc.
Address:	2739 S. St. Anthony Rd. W
City:	Huntingburg, Indiana 47542
Phone #:	(812) 326-2055
MSOP #:	M037-29151-00118

I hereby certify that Southern Indiana Hardwoods, Inc. is : still in operation.
 no longer in operation.
I hereby certify that Southern Indiana Hardwoods, Inc. is : in compliance with the requirements of MSOP M037-29151-00118.
 not in compliance with the requirements of MSOP M037-29151-00118.

Authorized Individual (typed):
Title:
Signature:
Date:

If there are any conditions or requirements for which the source is not in compliance, provide a narrative description of how the source did or will achieve compliance and the date compliance was, or will be achieved.

Noncompliance:

MALFUNCTION REPORT

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT OFFICE OF AIR QUALITY COMPLIANCE AND ENFORCEMENT BRANCH FAX NUMBER: (317) 233-6865

**This form should only be used to report malfunctions applicable to Rule 326 IAC 1-6
and to qualify for the exemption under 326 IAC 1-6-4.**

THIS FACILITY MEETS THE APPLICABILITY REQUIREMENTS BECAUSE IT HAS POTENTIAL TO EMIT 25 TONS/YEAR PARTICULATE MATTER ?_____, 25 TONS/YEAR SULFUR DIOXIDE ?_____, 25 TONS/YEAR NITROGEN OXIDES?_____, 25 TONS/YEAR VOC ?_____, 25 TONS/YEAR HYDROGEN SULFIDE ?_____, 25 TONS/YEAR TOTAL REDUCED SULFUR ?_____, 25 TONS/YEAR REDUCED SULFUR COMPOUNDS ?_____, 25 TONS/YEAR FLUORIDES ?_____, 100 TONS/YEAR CARBON MONOXIDE ?_____, 10 TONS/YEAR ANY SINGLE HAZARDOUS AIR POLLUTANT ?_____, 25 TONS/YEAR ANY COMBINATION HAZARDOUS AIR POLLUTANT ?_____, 1 TON/YEAR LEAD OR LEAD COMPOUNDS MEASURED AS ELEMENTAL LEAD ?_____, OR IS A SOURCE LISTED UNDER 326 IAC 2-5.1-3(2) ?_____. EMISSIONS FROM MALFUNCTIONING CONTROL EQUIPMENT OR PROCESS EQUIPMENT CAUSED EMISSIONS IN EXCESS OF APPLICABLE LIMITATION _____.

THIS MALFUNCTION RESULTED IN A VIOLATION OF: 326 IAC _____ OR, PERMIT CONDITION # _____ AND/OR PERMIT LIMIT OF _____

THIS INCIDENT MEETS THE DEFINITION OF "MALFUNCTION" AS LISTED ON REVERSE SIDE ? Y N

THIS MALFUNCTION IS OR WILL BE LONGER THAN THE ONE (1) HOUR REPORTING REQUIREMENT ? Y N

COMPANY: _____ PHONE NO. () _____
LOCATION: (CITY AND COUNTY) _____
PERMIT NO. _____ AFS PLANT ID: _____ AFS POINT ID: _____ INSP: _____
CONTROL/PROCESS DEVICE WHICH MALFUNCTIONED AND REASON: _____

DATE/TIME MALFUNCTION STARTED: ____/____/20____ _____ AM / PM

ESTIMATED HOURS OF OPERATION WITH MALFUNCTION CONDITION: _____

DATE/TIME CONTROL EQUIPMENT BACK-IN SERVICE ____/____/20____ _____ AM/PM

TYPE OF POLLUTANTS EMITTED: TSP, PM-10, SO2, VOC, OTHER: _____

ESTIMATED AMOUNT OF POLLUTANT EMITTED DURING MALFUNCTION: _____

MEASURES TAKEN TO MINIMIZE EMISSIONS: _____

REASONS WHY FACILITY CANNOT BE SHUTDOWN DURING REPAIRS:

CONTINUED OPERATION REQUIRED TO PROVIDE ESSENTIAL* SERVICES: _____

CONTINUED OPERATION NECESSARY TO PREVENT INJURY TO PERSONS: _____

CONTINUED OPERATION NECESSARY TO PREVENT SEVERE DAMAGE TO EQUIPMENT: _____

INTERIM CONTROL MEASURES: (IF APPLICABLE) _____

MALFUNCTION REPORTED BY: _____ TITLE: _____
(SIGNATURE IF FAXED)

MALFUNCTION RECORDED BY: _____ DATE: _____ TIME: _____

*SEE PAGE 2

Please note - This form should only be used to report malfunctions applicable to Rule 326 IAC 1-6 and to qualify for the exemption under 326 IAC 1-6-4.

326 IAC 1-6-1 Applicability of rule

Sec. 1. This rule applies to the owner or operator of any facility required to obtain a permit under 326 IAC 2-5.1 or 326 IAC 2-6.1.

326 IAC 1-2-39 "Malfunction" definition

Sec. 39. Any sudden, unavoidable failure of any air pollution control equipment, process, or combustion or process equipment to operate in a normal and usual manner.

***Essential services** are interpreted to mean those operations, such as, the providing of electricity by power plants. Continued operation solely for the economic benefit of the owner or operator shall not be sufficient reason why a facility cannot be shutdown during a control equipment shutdown.

If this item is checked on the front, please explain rationale:

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

Southern Indiana Hardwoods, Inc.
2739 S. St. Anthony Rd. W
Huntingburg, Indiana 47542

Affidavit of Construction

I, _____, being duly sworn upon my oath, depose and say:
(Name of the Authorized Representative)

1. I live in _____ County, Indiana and being of sound mind and over twenty-one (21) years of age, I am competent to give this affidavit.
2. I hold the position of _____ for _____.
(Title) (Company Name)
3. By virtue of my position with _____, I have personal
(Company Name)
knowledge of the representations contained in this affidavit and am authorized to make these representations on behalf of _____.
(Company Name)
4. I hereby certify that Southern Indiana Hardwoods, Inc. 2739 S. St. Anthony Rd. W, Huntingburg, Indiana 47542, has constructed and will operate the stationary lumber and pallet cut stock milling operation with the requirements and intent of the construction permit application received by the Office of Air Quality on April 8, 2010, and as permitted pursuant to New Source Construction Permit and Minor Source Operating Permit No. M037-29151-00118, Plant ID No. 037-00118 issued on _____.
5. **Permittee, please cross out the following statement if it does not apply:** Additional (operations/facilities) were constructed/substituted as described in the attachment to this document and were not made in accordance with the construction permit.

Further Affiant said not.

I affirm under penalties of perjury that the representations contained in this affidavit are true, to the best of my information and belief.

Signature _____
Date _____

STATE OF INDIANA)
)SS

COUNTY OF _____)

Subscribed and sworn to me, a notary public in and for _____ County and State of Indiana
on this _____ day of _____, 20 _____. My Commission expires: _____.

Signature _____
Name _____ (typed or printed)

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

Technical Support Document (TSD) for a Significant Permit Revision to a
Minor Source Operating Permit (MSOP)

Source Description and Location

Source Name: Southern Indiana Hardwoods, Inc.
Source Location: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
County: Dubois
SIC Code: 2421 (Sawmills and Planning Mills), 2426 (Hardwood Dimension and Flooring Mills), 2499 (Wood Products)
Operation Permit No.: M037-29151-00118
Operation Permit Issuance Date: August 26, 2010
Significant Permit Revision No.: 037-33274-00118
Permit Reviewer: Brian Wright

On June 5, 2013 the Office of Air Quality (OAQ) received an application from Southern Indiana Hardwoods, Inc. related to a modification to an existing stationary lumber and pallet cut stock milling operation.

Existing Approvals

The source was issued MSOP No. M037-29151-00118 on August 26, 2010. The source has received no additional approvals.

County Attainment Status

The source is located in Dubois County.

Pollutant	Designation
SO ₂	Better than national standards.
CO	Unclassifiable or attainment effective November 15, 1990.
O ₃	Unclassifiable or attainment effective June 15, 2004, for the 8-hour standard. ¹
PM ₁₀	Unclassifiable effective November 15, 1990.
NO ₂	Cannot be classified or better than national standards.
Pb	Not designated.
¹ Unclassifiable or attainment effective October 18, 2000, for the 1-hour ozone standard which was revoked effective June 15, 2005. Unclassifiable or attainment effective October 27, 2011, for PM _{2.5} .	

- (a) **Ozone Standards**
 Volatile organic compounds (VOC) and Nitrogen Oxides (NOx) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NOx emissions are considered when evaluating the rule applicability relating to ozone. Dubois County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (b) **PM_{2.5}**
 Dubois County has been classified as attainment for PM_{2.5}. On May 8, 2008 U.S. EPA promulgated the requirements for Prevention of Significant Deterioration (PSD) for PM_{2.5}

emissions. These rules became effective on July 15, 2008. On May 4, 2011 the air pollution control board issued an emergency rule establishing the direct PM_{2.5} significant level at ten (10) tons per year. This rule became effective, June 28, 2011. Therefore, direct PM_{2.5} and SO₂ emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2. 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

- (a) The fugitive emissions of criteria pollutants, hazardous air pollutants, and greenhouse gases are counted toward the determination of 326 IAC 2-6.1 (Minor Source Operating Permits) applicability.
- (b) Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2, 326 IAC 2-3, or 326 IAC 2-7, and there is no applicable New Source Performance Standard that was in effect on August 7, 1980, fugitive emissions are not counted toward the determination of PSD, Emission Offset, and Part 70 Permit applicability.

Status of the Existing Source

The table below summarizes the potential to emit of the entire source, prior to the proposed revision, after consideration of all enforceable limits established in the effective permits:

This PTE table is from TSD Appendix A of MSOP No. M037-29151-00118, issued on August 26, 2010.

Process/ Emission Unit	Potential To Emit of the Entire Source Prior to Revision (tons/year)									
	PM	PM10	PM2.5	SO ₂	NOx	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Woodworking Operations***	75.50	75.50	75.50	0.00	0.00	negl.*	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.05	0.05	0.05	0.00	1.43	0.04	0.24	0.00	negl.	negl.
Wood-Fired Heaters	7.01	6.61	5.73	0.44	8.58	0.23	10.51	0.00	0.59	0.33 (HCL)
Unpaved Roads (Fugitive)	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total PTE of Entire Source	84.92	82.75	81.33	0.44	10.01	0.27	10.75	0.00	0.59	0.33 (HCL)
Title V Major Source Thresholds**	NA	100	100	100	100	100	100	100,000	25	10

negl. = negligible
 These emissions are based upon Appendix A of MSOP No. M037-29151-00
 **The 100,000 CO₂e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD.
 ***PTE of the Woodworking Operations is after integral woodworking controls.

Description of Proposed Revision

The Office of Air Quality (OAQ) has reviewed an application, submitted by Southern Indiana Hardwoods, Inc. on June 5, 2013, relating to the replacement of two existing wood fired process heaters with a new bark fuel process heater and the revision of the maximum throughput of the woodworking operations based on performance tests conducted onsite.

The following is a list of the new and modified emission units:

- (a) One (1) Main Sawmill, including:
 - (1) One (1) debarker, constructed in 2000, approved for modification in 2013, with a maximum throughput of 18,500 pounds per hour, with particulate matter emissions uncontrolled;
 - (2) One (1) head saw, constructed in 2000, approved for modification in 2013, with a maximum throughput of 14,000 pounds per hour, with particulate matter emissions uncontrolled;
 - (3) One (1) three saw edger, constructed in 2000, approved for modification in 2013, with a maximum throughput of 5,000 pounds per hour, with particulate matter emissions uncontrolled; and
 - (4) One (1) three sided scrag mill, constructed in 2008, with a maximum production rate of 200 board feet per hour, with particulate matter emissions controlled by the Sawmill Cyclone.

- (b) One (1) Pallet Mill Cut Stock operation, constructed in 2000, approved for modification in 2013, with a maximum production rate of 500 board feet per hour, with particulate matter emissions controlled by the Pallet Mill Cyclone, including:
 - (1) One (1) two headed band saw;
 - (2) One (1) pop up trim saw;
 - (3) One (1) cross cut saw;
 - (4) One (1) sizer; and
 - (5) One (1) six head band saw.

- (c) One (1) Pelleting operation, constructed in 2009, approved for modification in 2013, with a maximum throughput of 7,000 pounds per hour, including:
 - (1) One (1) wood chipper, grinding wood scraps into chips, with a maximum throughput of 10,000 pounds per hour;
 - (2) One (1) wood chip storage pile and wood chip handling operation
 - (3) One (1) hammermill, grinding wood chips into wood fiber, with particulate matter emissions controlled by the Dryer Cyclone;
 - (4) One (1) bark fueled process heater, approved for construction in 2013, with a maximum heat input capacity of 15.0 MMBtu/hr, providing heat for the wood fiber drum dryer;

- (5) One (1) wood fiber drum dryer;
- (6) One (1) wood fiber storage silo;
- (7) One (1) vegetable oil spraying unit;
- (8) One (1) wood pellet extrusion and pellet breaking operation;
- (9) One (1) wood pellet screening operation, with wood fines returned to the vegetable oil spraying unit for reprocessing, with particulate matter emissions controlled by the Dryer Cyclone;
- (10) One (1) wood pellet storage bin; and
- (11) One (1) wood pellet screening operation;
- (12) One (1) wood pellet bagging operation.

“Integral Part of the Process” Determination

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 cyclone controls for determining operating permit level purposes and 326 IAC 6-3 (Particulate Emission Limitations for Manufacturing Processes) applicability. However, for purposes of determining the applicability of Prevention of Significant Deterioration (PSD), potential particulate matter emissions from the woodworking operations were calculated before consideration of the cyclone controls.

Enforcement Issues

There are no pending enforcement actions related to this revision.

Emission Calculations

See Appendix A of this TSD for detailed emission calculations.

Permit Level Determination – MSOP Revision

The following table is used to determine the appropriate permit level under 326 IAC 2-6.1-6. This table reflects the PTE before controls of the proposed revision. Control equipment is not considered federally enforceable until it has been required in a federally enforceable permit.

Process/ Emission Unit	PTE of Proposed Revision (tons/year)									
	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e	Total HAPs	Worst Single HAP
New Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25 (HCL)

Process/ Emission Unit	PTE of Proposed Revision (tons/year)									
	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e	Total HAPs	Worst Single HAP
Total PTE of Proposed Revision	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25 (HCL)

Pursuant to 326 IAC 2-6.1-6(i)(1)(E), this MSOP is revised through Significant Permit Revision because the proposed revision is not an Administrative Amendment or Minor Permit Revision and the proposed revision involves the construction of a new emission unit with a potential to emit greater than or equal to twenty-five (25) tons per year of PM, PM10, PM2.5.

PTE of the Entire Source After Issuance of the MSOP Revision

The table below summarizes the potential to emit of the entire source, with updated emissions shown as **bold** values and previous emissions shown as ~~strikethrough~~ values.

Process/ Emission Unit	Potential To Emit of the Entire Source to accommodate the Proposed Revision (tons/year)									
	PM	PM10*	PM2.5*	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Woodworking Operations***	75.50 58.62	75.50 58.62	75.50 58.62	0.00	0.00	negl.	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.02	0.05	0.05	0.11	0.98	0.08	0.56	0.00 959	negl.	negl.
Wood-Fired Heaters	7.04	6.64	5.73	0.44	8.58	0.23	40.54	0.00	0.59	0.33 (HCL)
Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25 (HCL)
Unpaved Roads (Fugitive)	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total PTE of Entire Source	84.92 97.80	82.75 93.24	81.33 88.10	0.44 1.76	40.04 15.43	0.27 0.93	40.75 39.98	0.00 1322	0.59 2.20	0.33 1.25 (HCL)
Title V Major Source Thresholds**	NA	100	100	100	100	100	100	100,000	25	10

negl. = negligible

*Under the Part 70 Permit program (40 CFR 70), PM10 and PM2.5, not particulate matter (PM), are each considered as a "regulated air pollutant".

**The 100,000 CO₂e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD.

***PTE of the Woodworking Operations is after integral woodworking controls.

The table below summarizes the potential to emit of the entire source after issuance of this revision, reflecting all limits, of the emission units. Any control equipment is considered federally enforceable only after issuance of this MSOP permit revision, and only to the extent that the effect of the control equipment is made practically enforceable in the permit. (Note: the table below was generated from the above table, with bold text un-bolded and strikethrough text deleted)

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Revision (tons/year)									
	PM	PM10*	PM2.5*	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Woodworking Operations***	58.62	58.62	58.62	0.00	0.00	negl.	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.02	0.05	0.05	0.11	0.98	0.08	0.56	959	negl.	negl.

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Revision (tons/year)									
	PM	PM10*	PM2.5*	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25 (HCL)
Unpaved Roads (Fugitive)	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total PTE of Entire Source	97.80	93.24	88.10	1.76	15.43	0.93	39.98	1322	2.20	1.25 (HCL)
Title V Major Source Thresholds**	NA	100	100	100	100	100	100	100,000	25	10

negl. = negligible
 *Under the Part 70 Permit program (40 CFR 70), PM10 and PM2.5, not particulate matter (PM), are each considered as a "regulated air pollutant".
 **The 100,000 CO₂e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD.
 ***PTE of the Woodworking Operations is after integral woodworking controls.

MSOP Status

- (a) This revision to an existing Title V minor stationary source will not change the minor status, because the uncontrolled/unlimited potential to emit criteria pollutants from the entire source will still be less than the Title V major source threshold levels. Therefore, the source will still be subject to the provisions of 326 IAC 2-6.1 (MSOP).
- (b) This revision will not change the minor status of the source, because the uncontrolled/unlimited potential to emit of any single HAP will still be less than ten (10) tons per year and the PTE of a combination of HAPs will still be less than twenty-five (25) tons per year. Therefore, this source is an area source under Section 112 of the Clean Air Act (CAA) and not subject to the provisions of 326 IAC 2-7.
- (c) This revision will not change the minor status of the source, because the uncontrolled/unlimited potential to emit greenhouse gases (GHGs) will still be less than the Title V subject to regulation threshold of one hundred thousand (100,000) tons of CO₂ equivalent emissions (CO₂e) per year. Therefore, the source is not subject to the provisions of 326 IAC 2-7.

PSD Minor Status

The uncontrolled/unlimited potential to emit PM, PM10, and PM2.5 from the entire source is greater than 250 tons per year.

In order to render the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration) not applicable, the PM, PM10, and PM2.5 emissions after control shall be less than the following emission limitations:

Emission Unit Description	Control Device	PM Emission Limit (lbs/hour)	PM10 Emission Limit (lbs/hour)	PM2.5 Emission Limit (lbs/hour)
Three-Sided Scrag Mill	Sawmill Cyclone	5.62	5.62	5.62
Pallet Mill Cut Stock Operation	Pallet Mill Cyclone	15.39	15.39	15.39

Compliance with these limits, combined with the potential to emit PM, PM10, and PM2.5 from all other emission units at this source, shall limit the source-wide total potential to emit of PM, PM10,

and PM2.5 to less than 250 tons per year, each, and shall render 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) not applicable.

Federal Rule Applicability Determination

New Source Performance Standards (NSPS)

- (a) The requirements of the New Source Performance Standard for Small Industrial-Commercial-Institutional Steam Generating Units, 40 CFR 60, Subpart Dc (326 IAC 12), are not included for this proposed revision, since the bark fueled process heater is not a steam generating unit.
- (b) There are no New Source Performance Standards (NSPS) (326 IAC 12 and 40 CFR Part 60) included for this proposed revision.

National Emission Standards for Hazardous Air Pollutants (NESHAP)

- (c) The requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Industrial, Commercial, and Institutional Boilers Area Sources, 40 CFR 63, Subpart JJJJJJ, (326 IAC 20), are not included for this proposed revision, since the bark fueled process heater is not a boiler.

The requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Industrial, Commercial, and Institutional Boilers Area Sources, 40 CFR 63, Subpart JJJJJJ, (326 IAC 20), are not included for the propane boiler, since this boiler is a gas fired unit as defined by 40 CFR 63.11237.

- (d) There are no National Emission Standards for Hazardous Air Pollutants (NESHAPs) (326 IAC 14, 326 IAC 20 and 40 CFR Part 63) included for this proposed revision.

Compliance Assurance Monitoring (CAM)

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

State Rule Applicability Determination

The following state rules are applicable to the proposed revision:

- (a) 326 IAC 2-6.1 (Minor Source Operating Permits (MSOP))
MSOP applicability is discussed under the Permit Level Determination – MSOP section above.
- (b) 326 IAC 2-2 (Prevention of Significant Deterioration(PSD))
This modification to an existing PSD minor stationary source will not change the PSD minor status, because the potential to emit of all attainment regulated pollutants from the entire source will continue to be less than the PSD major source threshold levels. Therefore, pursuant to 326 IAC 2-2, the PSD requirements do not apply. See PTE of the Entire Source After Issuance of the MSOP Revision Section above.
- (c) 326 IAC 2-3 (Emission Offset)
Dubois County has been classified as attainment for all criteria pollutants. Therefore, pursuant to 326 IAC 2-3, the Emission Offset requirements do not apply.

- (d) 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants (HAP))
 The proposed revision is not subject to the requirements of 326 IAC 2-4.1, since the unlimited potential to emit of HAPs from the new and modified units is less than ten (10) tons per year for any single HAP and less than twenty-five (25) tons per year of a combination of HAPs.
- (e) 326 IAC 2-6 (Emission Reporting)
 Pursuant to 326 IAC 2-6-1, this source is not subject to this rule, because it is not required to have an operating permit under 326 IAC 2-7 (Part 70), it is not located in Lake, Porter, or LaPorte County, and it does not emit lead into the ambient air at levels equal to or greater than 5 tons per year. Therefore, 326 IAC 2-6 does not apply.
- (f) 326 IAC 5-1 (Opacity Limitations)
 Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:
 - (1) Opacity shall not exceed an average of forty percent (40%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
 - (2) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.
- (g) 326 IAC 6-4 (Fugitive Dust Emissions Limitations)
 Pursuant to 326 IAC 6-4 (Fugitive Dust Emissions Limitations), the source shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4.
- (h) 326 IAC 12 (New Source Performance Standards)
 See Federal Rule Applicability Section of this TSD.
- (i) 326 IAC 20 (Hazardous Air Pollutants)
 See Federal Rule Applicability Section of this TSD.

Woodworking Operation

- (j) 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes)
 Pursuant to 326 IAC 6-3-2, the particulate matter (PM) from the woodworking operations shall not exceed the pound per hour limitations listed in the table below when operating at the specified process weight rate.

Emissions Unit	Process Weight Rate (tons/hr)	326 IAC 6-3-2 Allowable Particulate Emission Rate (lbs/hour)	Potential Uncontrolled Emissions (lbs/hr)	Potential Emissions After Controls (lbs/hr)	Is a Control Device Needed to Comply with 326 IAC 6-3-2 Limit?
Debarker	9.25	18.20	0.22	n/a	No
Head Saw	7	15.10	2.45	n/a	No
Three Saw Edger	2.5	7.58	0.88	n/a	No
Pelleting Operation	11.5	21.06	3.77	n/a	No
Three-Sided Scrag Mill*	1.6	5.62	101.01	1.01	Yes

Pallet Mill Cut Stock Operation*	7.2	15.39	505.05	5.05	Yes
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*The process weight rates for the three-sided scrag mill and the pallet mill cut stock operation were calculated using the conversion 1,000 board feet = 8 tons.

The pound per hour limitations were calculated with the following equation:

Interpolation of the data for the process weight rate up to sixty thousand (60,000) pounds per hour shall be accomplished by use of the equation:

$$E = 4.10 P^{0.67} \quad \text{where } E = \text{rate of emission in pounds per hour and} \\ P = \text{process weight rate in tons per hour}$$

The Sawmill Cyclone shall be in operation at all times that the Three-Sided Scrag Mill is in operation and the Pallet Mill Cyclone shall be in operation at all times that the Pallet Mill Cut Stock Operation is in operation, in order to comply with this limit.

Wood-Fired Process Heaters

- (k) 326 IAC 6-2 (Particulate Emission Limitations for Sources of Indirect Heating)
 The one (1) bark fueled process heater, with a maximum heat input capacity of 15.0 MMBtu/hr, is not subject to the conditions of 326 IAC 6-2 because the units are not sources of indirect heating.

Compliance Determination, Monitoring and Testing Requirements
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The existing compliance requirements will not change as a result of this revision. The source shall continue to comply with the applicable requirements and permit conditions as contained in MSOP No: M037-29151-00118, issued on April 26, 2010.

Proposed Changes

The following changes listed below are due to the proposed revision. Deleted language appears as ~~strikethrough~~ text and new language appears as **bold** text:

1. Section A.2 has been amended as follows to update the unit descriptions:

A.2 Emission Units and Pollution Control Equipment Summary

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

- (a) One (1) Main Sawmill, including:
- (1) One (1) debarker, constructed in 2000, ~~with a maximum throughput of 2000 board feet per hour~~ **approved for modification in 2013, with a maximum throughput of 18,500 pounds per hour**, with particulate matter emissions uncontrolled;
 - (2) One (1) head saw, constructed in 2000, ~~with a maximum throughput of 14,000 pounds per hour~~ **approved for modification in 2013, with a maximum throughput of 14,000 pounds per hour**, with particulate matter emissions uncontrolled;
 - (3) One (1) three saw edger, constructed in 2000, ~~with a maximum throughput of 5,000 pounds per hour~~ **approved for modification in 2013, with a maximum throughput of 5,000 pounds per hour**, with particulate matter emissions uncontrolled; and
 - (4) One (1) three sided scrag mill, constructed in 2008, with a maximum production rate of 200 board feet per hour, with particulate matter emissions controlled by the

Sawmill Cyclone.

- (c) One (1) Pelleting operation, constructed in 2009, **approved for modification in 2013**, with a maximum throughput of ~~6,000~~ **7,000** pounds per hour, including:
- (1) One (1) wood chipper, grinding wood scraps into chips, **with a maximum throughput of 10,000 pounds per hour**;
 - (2) One (1) wood chip storage pile and wood chip handling operation
 - (3) One (1) hammermill, grinding wood chips into wood fiber, with particulate matter emissions controlled by the Dryer Cyclone;
 - (4) ~~Two (2) wood-fired process heaters, with a maximum heat input capacity of 2.0 MMBtu/hr, each~~ **One (1) bark fueled process heater, approved for construction in 2013, with a maximum heat input capacity of 15.0 MMBtu/hr**, providing heat for the wood fiber drum dryer;
 - (5) One (1) wood fiber drum dryer;
 - (6) One (1) wood fiber storage silo;
 - (7) One (1) vegetable oil spraying unit;
 - (8) One (1) wood pellet extrusion and pellet breaking operation;
 - (9) One (1) wood pellet screening operation, with wood fines returned to the vegetable oil spraying unit for reprocessing, with particulate matter emissions controlled by the Dryer Cyclone;
 - (10) One (1) wood pellet storage bin; and
 - (11) One (1) wood pellet screening operation;
 - (12) One (1) wood pellet bagging operation.

2. Section D.1 has been amended as follows to amend the PM limits under 326 IAC 6-3-2:

SECTION D.1 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

- (a) One (1) Main Sawmill, including:
- (1) One (1) debarker, constructed in 2000, **approved for modification in 2013**, with a maximum throughput of ~~2000 board feet per hour~~ **18,500 pounds per hour**, with particulate matter emissions uncontrolled;
 - (2) One (1) head saw, constructed in 2000, **approved for modification in 2013, with a maximum throughput of 14,000 pounds per hour**, with particulate matter emissions uncontrolled;

- (3) One (1) three saw edger, constructed in 2000, **approved for modification in 2013, with a maximum throughput of 5,000 pounds per hour**, with particulate matter emissions uncontrolled; and
- (4) One (1) three sided scrag mill, constructed in 2008, with a maximum production rate of 200 board feet per hour, with particulate matter emissions controlled by the Sawmill Cyclone.
- (b) One (1) Pallet Mill Cut Stock operation, constructed in 2000, with a maximum production rate of 900 board feet per hour, with particulate matter emissions controlled by the Pallet Mill Cyclone, including:
 - (1) One (1) two headed band saw;
 - (2) One (1) pop up trim saw;
 - (3) One (1) cross cut saw;
 - (4) One (1) sizer; and
 - (5) One (1) six head band saw.
- (c) One (1) Pelleting operation, constructed in 2009, **approved for modification in 2013**, with a maximum throughput of ~~6,000~~ **7,000** pounds per hour, including:
 - (1) One (1) wood chipper, grinding wood scraps into chips, **with a maximum throughput of 10,000 pounds per hour**;
 - (2) One (1) wood chip storage pile and wood chip handling operation
 - (3) One (1) hammermill, grinding wood chips into wood fiber, with particulate matter emissions controlled by the Dryer Cyclone;
 - (4) ~~Two (2) wood fired process heaters, with a maximum heat input capacity of 2.0 MMBtu/hr, each~~ **One (1) bark fueled process heater, approved for construction in 2013, with a maximum heat input capacity of 15.0 MMBtu/hr**, providing heat for the wood fiber drum dryer;
 - (5) One (1) wood fiber drum dryer;
 - (6) One (1) wood fiber storage silo;
 - (7) One (1) vegetable oil spraying unit;
 - (8) One (1) wood pellet extrusion and pellet breaking operation;
 - (9) One (1) wood pellet screening operation, with wood fines returned to the vegetable oil spraying unit for reprocessing, with particulate matter emissions controlled by the Dryer Cyclone;
 - (10) One (1) wood pellet storage bin; and
 - (11) One (1) wood pellet screening operation;

(12) One (1) wood pellet bagging operation.

D.1.1 Particulate Matter (PM) Limitations [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2, the particulate matter (PM) from the woodworking operations shall not exceed the pound per hour limitations listed in the table below when operating at the specified process weight rate.

Emissions Unit	Process Weight Rate (tons/hr)	Pound per Hour Limitation 326 IAC 6-3-2 Allowable Particulate Emission Rate (lbs/hour)
Debarker	15.4 9.25	25.64 18.20
Head Saw	13.4 7	23.33 15.10
Three Saw Edger	5.4 2.5	12.69 7.58
Pelleting Operation	9.0 11.5	17.87 21.06
Three-Sided Scrag Mill	1.6	5.62
Pallet Mill Cut Stock Operation	7.2	15.39

- PSD minor limitations for PM, PM10, and PM2.5 have been added to the permit as Condition D.1.2, with all subsequent conditions renumbered. In addition, the Visible Emissions Notations and Cyclone Failure Detection conditions have been revised to provide clarification.

D.1.2 PSD Minor Limitations [326 IAC 2-2]

In order to render the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration) not applicable, the PM, PM10, and PM2.5 emissions after control shall be less than the following emission limitations:

Emission Unit Description	Control Device	PM Emission Limit (lbs/hour)	PM10 Emission Limit (lbs/hour)	PM2.5 Emission Limit (lbs/hour)
Three-Sided Scrag Mill	Sawmill Cyclone	5.62	5.62	5.62
Pallet Mill Cut Stock Operation	Pallet Mill Cyclone	15.39	15.39	15.39

Compliance with these limits, combined with the potential to emit PM, PM10, and PM2.5 from all other emission units at this source, shall limit the source-wide total potential to emit of PM, PM10, and PM2.5 to less than 250 tons per year, each, and shall render 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) not applicable.

D.1.32 Preventive Maintenance Plan [326 IAC 1-6-3]

Compliance Determination Requirements

D.1.34 Particulate Control

In order to comply with Conditions D.1.1 and D.1.2, the Sawmill Cyclone shall be in operation at all times that the Three-Sided Scrag Mill is in operation and the Pallet Mill Cyclone shall be in

operation at all times that the Pallet Mill Cut Stock Operation is in operation.

Compliance Monitoring Requirements [326 IAC 2-6.1-5(a)(2)]

D.1.45 Visible Emissions Notations

- ~~(e) Section C - Response to Excursions or Exceedances, of this permit, shall contain troubleshooting contingency and response steps for when an abnormal emission is observed. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances shall be considered a deviation from this permit.~~
- (e) If abnormal emissions are observed, the Permittee shall take reasonable response steps. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.**

D.1.56 Cyclone Inspections

D.1.67 Cyclone Failure Detection

Failed units and the associated process will be shut down immediately until the failed units have been repaired or replaced. ~~Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances shall be considered a deviation from this permit.~~ **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 2-6.1-5(a)(2)]

D.1.78 Record Keeping Requirements

- (a) To document the compliance status with Condition D.1.45, the Permittee shall maintain records of daily visible emission notations of the Saw Mill Cyclone and the Pallet Mill Cyclone stack exhausts. The Permittee shall include in its daily record when a visible emission notation is not taken and the reason for the lack of visible emission notation (e.g., the process did not operate that day).
- (b) To document the compliance status with Condition D.1.56, the Permittee shall maintain records of the results of the inspections required under Conditions D.1.6.

Conclusion and Recommendation

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant. An application for the purposes of this review was received on June 5, 2013

The construction and operation of this proposed revision shall be subject to the conditions of the attached proposed MSOP Significant Permit Revision No. 037-33274-00118. The staff recommends to the Commissioner that this MSOP Significant Permit Revision be approved.

IDEM Contact

- (a) Questions regarding this proposed permit can be directed to Brian Wright 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) 234-6544 or toll free at 1-800-451-6027 extension 4-6544.
- (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.in.gov/idem

**Attachment A: Emissions Calculations
Summary**

Company Name: Southern Indiana Hardwoods, Inc.
SourceAddress: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

Unlimited Potential to Emit (tons/year) (Before Integral Woodworking Controls)											
Emissions Unit	PM	PM10	PM2.5	SO₂	NOx	VOC	CO	GHGs as CO2e	Total HAPs	Highest Single HAP	
Woodworking Operations**	2687	2687	2687	0.00	0.00	negl.*	0.00	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.02	0.05	0.05	0.11	0.98	0.08	0.56	959	negl.	negl.	negl.
Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25	HCL
Unpaved Roads	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0	0.00	0.00	0.00
Total	2726	2721	2716	1.76	15.43	0.93	39.98	1322	2.20	1.25	HCL

Unlimited Potential to Emit (tons/year) (After Integral Woodworking Controls)											
Emissions Unit	PM	PM10	PM2.5	SO₂	NOx	VOC	CO	GHGs as CO2e	Total HAPs	Highest Single HAP	
Woodworking Operations**	58.62	58.62	58.62	0.00	0.00	negl.*	0.00	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.02	0.05	0.05	0.11	0.98	0.08	0.56	959	negl.	negl.	negl.
Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25	HCL
Unpaved Roads	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0	0.00	0.00	0.00
Total	97.80	93.24	88.10	1.76	15.43	0.93	39.98	1322	2.20	1.25	HCL

Limited Potential to Emit (tons/year)											
Emissions Unit	PM	PM10	PM2.5	SO₂	NOx	VOC	CO	GHGs as CO2e	Total HAPs	Highest Single HAP	
Woodworking Operations***	124.10	124.10	124.10	0.00	0.00	negl.*	0.00	0.00	0.00	0.00	0.00
Propane-Fired Boiler	0.02	0.05	0.05	0.11	0.98	0.08	0.56	959	negl.	negl.	negl.
Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362	2.20	1.25	HCL
Unpaved Roads	2.37	0.60	0.06	0.00	0.00	0.00	0.00	0	0.00	0.00	0.00
Total	163.28	158.72	153.58	1.76	15.43	0.93	39.98	1322	2.20	1.25	HCL

*The VOC from vegetable oil application, used in the pelleting process, is negligible.

**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 cyclone controls for determining operating permit level purposes and 326 IAC 6-3 (Particulate Emission Limitations for Manufacturing Processes) applicability. However, for purposes of determining the applicability of Prevention of Significant Deterioration (PSD), potential particulate matter emissions from the woodworking operations were calculated before consideration of the cyclone controls.

**Attachment A: Emissions Calculations
Modification Summary**

Company Name: Southern Indiana Hardwoods, Inc.
SourceAddress: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

New Units	Uncontrolled/Unlimited Potential to Emit (tons/year)											
	Emissions Unit	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e	Total HAPs	Highest Single HAP	
	New Wood-Fired Heater	36.79	33.97	29.37	1.64	14.45	0.85	39.42	362.11	2.20	1.17	HCL

Modified Units	Unlimited Potential to Emit (tons/year) (After Integral Woodworking Controls)											
	Emissions Unit	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e	Total HAPs	Highest Single HAP	
	Previous Woodworking Emissions	75.00	75.00	75.00	0.00	0.00	negl.*	0.00	0.00	0.00	0.00	0.00
	New Woodworking Emissions	58.62	58.62	58.62	0.00	0.00	negl.*	0.00	0.00	0.00	0.00	0.00
	Change in PTE	-16.38	-16.38	-16.38	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

*The VOC from vegetable oil application, used in the pelleting process, is negligible.

**Appendix A: Emission Calculations
Woodworking Operations (After Revision)**

Company Name: Southern Indiana Hardwoods, Inc.
SourceAddress: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

Emission Unit	Throughput (lbs/hr)	Emission Factor (lb/ton)	Potential Uncontrolled PM/PM10/PM2.5 Emissions (lb/hr)	Potential Uncontrolled PM/PM10/PM2.5 Emissions (tons/yr)
Debarker	18500	0.024	0.22	0.97
Head Saw	14000	0.35	2.45	10.73
Three Saw Edger	5000	0.35	0.875	3.83
Pelleting Operation - Wood Chipper	10000	0.024	0.12	0.53
Pelleting Operation - Hammermill	7000	0.024	0.084	0.37
Pelleting Operation - Pellet Breaking	6000	0.024	0.072	0.32
Pelleting Operation - Sawdust Handling	7000	1.00	3.50	15.33

Methodology

Potential Uncontrolled PM/PM10/PM2.5 (lb/hr) = Throughput (lbs/hr) * Emission Factor (lb/ton)
 Potential Uncontrolled PM/PM10/PM2.5 (tons/yr) = Potential Uncontrolled PM/PM10/PM2.5 (lb/hr) * 8760 hr/yr * 1 ton/2000 lbs
 The emission factors used in the above table are from AP-42, 4th Edition, September 1985, Table 10.3-1.
 The emission factor for sawdust handling is 1 pound per ton of sawdust.

Emission Unit	Amount of sawdust collected from control device (lbs/hr)	Control Efficiency	Potential Uncontrolled PM/PM10/PM2.5 Emissions (lb/hr)	Potential Controlled PM/PM10/PM2.5 Emissions (lb/hr)	Potential Uncontrolled PM/PM10/PM2.5 Emissions (tons/yr)	Potential Controlled PM/PM10/PM2.5 Emissions (tons/yr)	PSD Minor Limit PM/PM10/PM2.5 (lb/hr)	PSD Minor Limited PM/PM10/PM2.5 Emissions (tons/yr)	Equivalent Limited Control Efficiency (%)
Three Sided Scrag Mill	100	99%	101.01	1.01	442.42	4.42	5.62	24.62	94.4%
Pallet Mill Cut Stock Operation	500	99%	505.05	5.05	2212.12	22.12	15.39	67.41	97.0%

Total Unlimited Potential to Emit (Before Integral Woodworking Controls) (tons/year) = 2686.62
Total Unlimited Potential to Emit (After Integral Woodworking Controls) (tons/year) = 58.62
Limited Potential to Emit (tons/year) = 124.10

Methodology

Potential Uncontrolled PM/PM10/PM2.5 Emissions (lb/hr) = Amount of sawdust collected (lbs/hr) / Control Efficiency
 Potential Controlled PM/PM10/PM2.5 Emissions (lb/hr) = Potential Uncontrolled PM/PM10/PM2.5 Emissions (lb/hr) * (1 - Control Efficiency)
 Potential Uncontrolled PM/PM10/PM2.5 Emissions (tons/yr) = Potential Uncontrolled PM/PM10/PM2.5 Emissions (lb/hr) * 8760 hr/yr * 1 ton/2000 lbs
 Potential Controlled PM/PM10/PM2.5 Emissions (tons/yr) = Potential Uncontrolled PM/PM10/PM2.5 Emissions (tons/yr) * (1 - Control Efficiency)

In October 1993 a Final Order Granting Summary Judgment was signed by Administrative Law Judge ("ALJ") Garretson 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 cyclone controls for determining operating permit level purposes and 326 IAC 6-3 (Particulate Emission Limitations for Manufacturing Processes) applicability. However, for purposes of determining the applicability of Prevention of Significant Deterioration (PSD), potential particulate matter emissions from the woodworking operations were calculated before consideration of the cyclone controls.

**Appendix A: Emission Calculations
LPG-Propane - Fueled Boiler**

Company Name: Southern Indiana Hardwoods, Inc.
SourceAddress: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

Heat Input Capacity Potential Throughput SO2 Emission factor = 0.10 x S
MMBtu/hr kgals/year S = Sulfur Content = 15.00 grains/100ft³

1.57 150.12

Emission Factor in lb/kgal	Pollutant						
	PM*	PM10*	direct PM2.5**	SO2	NOx	VOC	CO
	0.2	0.7	0.7	1.5	13.0	1.0	7.5
				(0.10S)		**TOC value	
Potential Emission in tons/yr	0.02	0.05	0.05	0.11	0.98	0.08	0.56

*PM emission factor is filterable PM only. PM emissions are stated to be all less than 10 microns in aerodynamic equivalent diameter,
** No direct PM2.5 emission factor was given. Direct PM2.5 is a subset of PM10. If one assumes all PM10 to be all direct PM2.5,
then a worst case assumption of direct PM2.5 can be made.
**The VOC value given is TOC. The methane emission factor is 0.2 lb/kgal.

Methodology

1 gallon of LPG has a heating value of 94,000 Btu
1 gallon of propane has a heating value of 91,500 Btu (use this to convert emission factors to an energy basis for propane)
(Source - AP-42 (Supplement B 10/96) page 1.5-1)
Potential Throughput (kgals/year) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1kgal per 1000 gallon x 1 gal per 0.0915 MMBtu
Emission Factors are from AP42 (7/08), Table 1.5-1 (SCC #1-02-010-02)
Propane Emission Factors shown. Please see AP-42 for butane.
Emission (tons/yr) = Throughput (kgals/yr) x Emission Factor (lb/kgal) / 2,000 lb/ton

Greenhouse Gases

	Greenhouse Gas		
	CO2	CH4	N2O
Emission Factor in lb/kgal	12,500	0.2	0.9
Potential Emission in tons/yr	938	0.02	0.07
Summed Potential Emissions in tons/yr	938		
CO2e Total in tons/yr	959		

Methodology

The CO2 Emission Factor for Propane is 12500. The CO2 Emission Factor for Butane is 14300.
Emission Factors are from AP 42 (7/08), Table 1.5-1 (SCC #1-02-010-02)
Global Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.
Emission (tons/yr) = Throughput (kgals/ yr) x Emission Factor (lb/kgal)/2,000 lb/ton
CO2e (tons/yr) = CO2 Potential Emission ton/yr x CO2 GWP (1) + CH4 Potential Emission ton/yr x CH4

**Appendix A: Emissions Calculations
External Combustion Boiler
Wood Waste Combustion (uncontrolled)
Bark/Bark and Wet Wood**

Company Name: Southern Indiana Hardwoods, Inc.
SourceAddress: 2739 S. St. Anthony Road W, Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

Capacity (MMBtu/hr) 15

	Pollutant						
	PM*	PM10*	PM2.5*	SO2	NOx	VOC	CO**
Emission Factor in lb/MMBtu	0.56	0.517	0.447	0.025	0.22	0.013	0.6
Potential Emissions in tons/yr	36.79	33.97	29.37	1.64	14.45	0.85	39.42

Wet wood is considered to be greater than or equal to 20% moisture content. Dry wood is considered to be less than 20% moisture content.
*The PM10 and PM2.5 emission factors include the condensible PM emission factor of 0.017 lb/MMBtu, measured by EPA Method 202 (or equivalent) and the appropriate filterable PM emission factor, measured by EPA Method 5 (or equivalent). The PM emission factor is filterable PM measured by EPA Method 5 (or equivalent).
**The CO emission factor is for stokers and dutch ovens/fuel cells. Change the emission factor to 0.17 lb/MMBtu if the calculations are for a fluidized bed combustor.

Methodology

To convert from tons/hr capacity to MMBtu/hr capacity:
Heat Input Capacity (MMBtu/hr) = Capacity (tons/hr) x Higher Heating Value of wood fuel (Btu/lb) x (1 MMBtu/10⁶ Btu) x 2000 lbs/1 ton
Emission Factors are from AP-42 Chapter 1.6 (revised 3/02), SCCs #1-0X-009-YY where X = 1 for utilities, 2 for industrial, and 3 for commercial/institutional; Y = 01 for bark-fired boilers, 02 for bark and wet wood-fired boilers, 03 for wet wood-fired boilers, and 08 for dry wood-fired boilers
Emissions (tons/yr) = Capacity (MMBtu/hr) x Emission Factor (lb/MMBtu) x 8760hrs/yr x 1ton/2000lbs

Capacity (MMBtu/hr) 15

	Selected Hazardous Air Pollutants				
	Acrolein	Benzene	Formaldehyde	Hydrogen Chloride	Styrene
Emission Factor in lb/MMBtu	4.0E-03	4.2E-03	4.4E-03	1.9E-02	1.9E-03
Potential Emissions in tons/yr	0.26	0.28	0.29	1.25	0.12
	Total HAP				2.20

Methodology

To convert from tons/hr capacity to MMBtu/hr capacity:
Heat Input Capacity (MMBtu/hr) = Capacity (tons/hr) x Higher Heating Value of wood fuel (Btu/lb) x (1 MMBtu/10⁶ Btu) x 2000 lbs/1 ton
Emission Factors are from AP-42 Chapter 1.6 (revised 3/02), SCCs #1-0X-009-YY where X = 1 for utilities, 2 for industrial, and 3 for commercial/institutional; Y = 01 for bark-fired boilers, 02 for bark and wet wood-fired boilers, 03 for wet wood-fired boilers, and 08 for dry wood-fired boilers
Emissions (tons/yr) = Capacity (MMBtu/hr) x Emission Factor (lb/MMBtu) x 8760hrs/yr x 1ton/2000lbs
These factors include the five HAPs with the highest AP-42 emission factors.

Capacity (MMBtu/hr) 15

	Greenhouse Gases		
	CO2	CH4	N2O
Emission Factor in kg/mmBtu from 40 CFR 98	**	0.032	
Emission Factor in lb/mmBtu from AP-42			0.013
Potential Emission in tons/yr	**	4.6	0.9
Summed Potential Emissions in tons/yr		5	**
CO2e Total in tons/yr		362	**

Methodology

To convert from tons/hr capacity to MMBtu/hr capacity:
Heat Input Capacity (MMBtu/hr) = Capacity (tons/hr) x Higher Heating Value of wood fuel (Btu/lb) x (1 MMBtu/10⁶ Btu) x 2000 lbs/1 ton
CO2 and CH4 Emission Factors from Tables C-1 and 2 of 40 CFR Part 98 Subpart C. N2O emission factor from AP-43 Chapter 1.6 (revised 3/02).
Global Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.
Potential Emission (tons/yr) = Heat Input Capacity mmBtu/hr x Emission Factor (kg/mmBtu) x 2.20462 lb/kg x 8760 hrs/yr /2,000 lb/ton
Potential Emission (tons/yr) = Heat Input Capacity mmBtu/hr x Emission Factor (lb/mmBtu) x 8760 hrs/yr /2,000 lb/ton
CO2e (tons/yr) = CH4 Potential Emission ton/yr x CH4 GWP (21) + N2O Potential Emission ton/yr x N2O GWP (310).**
** On July 1, 2011 EPA stayed the counting of CO2 emissions from Bioenergy and other Biogenic Sources.

**Appendix A: Emission Calculations
Fugitive Dust Emissions - Unpaved Roads**

Company Name: Southern Indiana Hardwoods, Inc.
Source Address: 2739 S. St. Anthony Road W. Huntingburg, IN 47542
Permit Number: 037-33274-00118
Reviewer: Brian Wright
Date: June 7, 2013

Unpaved Roads at Industrial Site

The following calculations determine the amount of emissions created by unpaved roads, based on 8,760 hours of use and AP-42, Ch 13.2.2 (12/2003).

Vehicle Information (provided by source)

Type	Maximum number of vehicles	Number of one-way trips per day per vehicle	Maximum trips per day (trip/day)	Maximum Weight Loaded (tons/trip)	Total Weight driven per day (ton/day)	Maximum one-way distance (feet/trip)	Maximum one-way distance (mi/trip)	Maximum one-way miles (miles/day)	Maximum one-way miles (miles/yr)
Vehicle (entering plant) (one-way trip)	3.0	2.0	6.0	40.0	240.0	1400	0.265	1.6	580.7
Vehicle (leaving plant) (one-way trip)	3.0	2.0	6.0	40.0	240.0	700	0.133	0.8	290.3
Total			12.0		480.0			2.4	871.0

Average Vehicle Weight Per Trip = $\frac{40.0}{1}$ tons/trip
 Average Miles Per Trip = $\frac{0.20}{1}$ miles/trip

Unmitigated Emission Factor, $E_f = k \left[\frac{s}{12} \right]^a \left[\frac{W}{3} \right]^b$ (Equation 1a from AP-42 13.2.2)

	PM	PM10	PM2.5	
where k =	4.9	1.5	0.15	lb/mi = particle size multiplier (AP-42 Table 13.2.2-2 for Industrial Roads)
s =	4.8	4.8	4.8	% = mean % silt content of unpaved roads (AP-42 Table 13.2.2-3 Sand/Gravel Processing Plant Road)
a =	0.7	0.9	0.9	= constant (AP-42 Table 13.2.2-2)
W =	40.0	40.0	40.0	tons = average vehicle weight (provided by source)
b =	0.45	0.45	0.45	= constant (AP-42 Table 13.2.2-2)

Taking natural mitigation due to precipitation into consideration, Mitigated Emission Factor, $E_{ext} = E_f \left[\frac{365 - P}{365} \right]$

Mitigated Emission Factor, $E_{ext} = E_f \left[\frac{365 - P}{365} \right]$
 where P = 125 days of rain greater than or equal to 0.01 inches (see Fig. 13.2.2-1)

	PM	PM10	PM2.5	
Unmitigated Emission Factor, $E_f =$	8.28	2.11	0.21	lb/mile
Mitigated Emission Factor, $E_{ext} =$	5.44	1.39	0.14	lb/mile

Process	Unmitigated PTE of PM (tons/yr)	Unmitigated PTE of PM10 (tons/yr)	Unmitigated PTE of PM2.5 (tons/yr)	Mitigated PTE of PM (tons/yr)	Mitigated PTE of PM10 (tons/yr)	Mitigated PTE of PM2.5 (tons/yr)
Vehicle (entering plant) (one-way trip)	2.40	0.61	0.06	1.58	0.40	0.04
Vehicle (leaving plant) (one-way trip)	1.20	0.31	0.03	0.79	0.20	0.02
	3.60	0.92	0.09	2.37	0.60	0.06

Methodology

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

Abbreviations

PM = Particulate Matter
 PM10 = Particulate Matter (<10 um)
 PTE = Potential to Emit



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

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

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

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

TO: Nick Merkley
Southern Indiana Hardwoods, Inc.
2739 S St Anthony Rd W
Huntingburg, IN 47542

DATE: August 13, 2013

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

SUBJECT: Final Decision
Significant Permit Revision to MSOP
037-33274-00118

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:
OAQ Permits Branch Interested Parties List

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

Final Applicant Cover letter.dot 6/13/2013



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

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Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

August 13, 2013

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: Southern Indiana Hardwoods, Inc.
Permit Number: 037-33274-00118

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 6/13/2013

Mail Code 61-53

IDEM Staff	PWAY 8/13/2013 Southern Indiana Hardwoods, Inc 037-33274-00118 (final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING	
Name and address of Sender		Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

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		Nick Merkley Southern Indiana Hardwoods, Inc 2739 S St Anthony Rd W Huntingburg IN 47542 (Source CAATS)										
2		Huntingburg City Council and Mayors Office 508 E 4th St Huntingburg IN 47542-1319 (Local Official)										
3		Dubois County Commissioners One Courthouse Square Jasper IN 47546 (Local Official)										
4		Mr. Alec Kalla 8733 W. Summit Circle Drive French Lick IN 47432 (Affected Party)										
5		DuBois County Health Department 1187 S St. Charles Street Jasper IN 47546 (Health Department)										
6		Jasper Public Library 1116 Main Street Jasper IN 47546 (Library)										
7		John Blair 800 Adams Ave Evansville IN 47713 (Affected Party)										
8												
9												
10												
11												
12												
13												
14												
15												

Total number of pieces Listed by Sender	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 Domestic Mail Manual R900, S913, and S921 for limitations of coverage on inured and COD mail. See International Mail Manual for limitations o coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
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