

Synthetic Minor Determination and/or **Netting Determination**

Synthetic Minor Determination

Shelly Materials - Plant 45

PTI 14-05067

A. Source Description

Shelly Materials #45 has submitted a Permit to Install application (PTI 14-05067) to allow them to burn used oil and No.2 fuel oil in the asphalt concrete batch plant. They currently use natural gas and would still like to be able to burn it in the future.

B. Facility Emissions and Attainment Status

This facility is located in Hamilton County, Ohio and is presently a minor facility. Hamilton County is classified as attainment for all pollutants.

C. Source Emissions

Potential emissions of CO and PM from this emissions unit are above the threshold to be considered a major facility for PSD purposes. Based on maximum capacity and 8,760 hours of operation, the potential emissions would be 58867.20 TPY PM and 8278.2 TPY PM-10 emissions from stack and 735.84 TPY CO. The facility will keep records and submit reports as described in the PTI to ensure compliance with the emission and production limits. They are also required to use a baghouse for control of particulate matter.

The asphalt production limitation will limit stack PM emissions to 7.35 TPY, stack PM-10 emissions to 4.73 TPY and the CO emissions to 70.0 TPY as a rolling, 12-month summation. The facility will maintain monthly records and submit annual reports as described in the PTI to ensure compliance with the production and emission limits.

D. Conclusion

With this permit, the federally enforceable terms require the use of control equipment so that the facility has a potential to emit less than 100 tons per year of CO, PM and PM-10. Shelly Materials #45 will not be considered a major facility for the purpose of Title V permitting. In addition the particulate matter, PM10 and CO emissions will be less than 250 tons per year thus PSD will not apply.



State of Ohio Environmental Protection Agency

Street Address:

Mailing Address:

Lazarus Gov. Center TELE: (614) 644-3020 FAX: (614) 644-2329

Lazarus Gov. Center

**RE: DRAFT PERMIT TO INSTALL
HAMILTON COUNTY**

CERTIFIED MAIL

Application No: 14-05067

DATE: 3/15/2001

Shelly Materials - Plant 45
Larry Shively
P.O. Box 266 8775 Blackbird Lane
Thornville, OH

You are hereby notified that the Ohio Environmental Protection Agency has made a draft action recommending that the Director issue a Permit to Install for the air contaminant source(s) [emissions unit(s)] shown on the enclosed draft permit. This draft action is not an authorization to begin construction or modification of your emissions unit(s). The purpose of this draft is to solicit public comments on the proposed installation. A public notice concerning the draft permit will appear in the Ohio EPA Weekly Review and the newspaper in the county where the facility will be located. Public comments will be accepted by the field office within 30 days of the date of publication in the newspaper. Any comments you have on the draft permit should be directed to the appropriate field office within the comment period. A copy of your comments should also be mailed to Robert Hodanbosi, Division of Air Pollution Control, Ohio EPA, P.O. Box 1049, Columbus, OH, 43266-0149.

A Permit to Install may be issued in proposed or final form based on the draft action, any written public comments received within 30 days of the public notice, or record of a public meeting if one is held. You will be notified in writing of a scheduled public meeting. Upon issuance of a final Permit to Install a fee of **\$1000** will be due. Please do not submit any payment now.

The Ohio EPA is urging companies to investigate pollution prevention and energy conservation. Not only will this reduce pollution and energy consumption, but it can also save you money. If you would like to learn ways you can save money while protecting the environment, please contact our Office of Pollution Prevention at (614) 644-3469. If you have any questions about this draft permit, please contact the field office where you submitted your application, or Mike Ahern, Field Operations & Permit Section at (614) 644-3631.

Very truly yours,

Thomas G. Rigo, Manager
Field Operations and Permit Section
Division of Air Pollution Control

CC: USEPA HCDES KY IN OH-KY-IN Reg Coun of Gov



**Permit To Install
Terms and Conditions**

**Issue Date: To be entered upon final issuance
Effective Date: To be entered upon final issuance**

DRAFT PERMIT TO INSTALL 14-05067

Application Number: 14-05067
APS Premise Number: 1431443377
Permit Fee: **To be entered upon final issuance**
Name of Facility: Shelly Materials - Plant 45
Person to Contact: Larry Shively
Address: P.O. Box 266 8775 Blackbird Lane
Thornville, OH 43076

Location of proposed air contaminant source(s) [emissions unit(s)]:
**387 Columbia Avenue
Cincinnati, Ohio**

Description of proposed emissions unit(s):
Adding used oil and No. 2 fuel oil for as fuel sources for the batch plant.

The above named entity is hereby granted a Permit to Install for the above described emissions unit(s) pursuant to Chapter 3745-31 of the Ohio Administrative Code. Issuance of this permit does not constitute expressed or implied approval or agreement that, if constructed or modified in accordance with the plans included in the application, the above described emissions unit(s) of environmental pollutants will operate in compliance with applicable State and Federal laws and regulations, and does not constitute expressed or implied assurance that if constructed or modified in accordance with those plans and specifications, the above described emissions unit(s) of pollutants will be granted the necessary permits to operate (air) or NPDES permits as applicable.

This permit is granted subject to the conditions attached hereto.

Ohio Environmental Protection Agency

Director

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Part I - GENERAL TERMS AND CONDITIONS

A. Permit to Install General Terms and Conditions

1. Compliance Requirements

The emissions unit(s) identified in this Permit to Install shall remain in full compliance with all applicable State laws and regulations and the terms and conditions of this permit.

2. Reporting Requirements Related to Monitoring and Recordkeeping Requirements

The permittee shall submit required reports in the following manner:

- a. Reports of any required monitoring and/or recordkeeping information shall be submitted to the appropriate Ohio EPA District Office or local air agency.
- b. Except as otherwise may be provided in the terms and conditions for a specific emissions unit, quarterly written reports of (a) any deviations (excursions) from emission limitations, operational restrictions, and control device operating parameter limitations that have been detected by the testing, monitoring, and recordkeeping requirements specified in this permit, (b) the probable cause of such deviations, and (c) any corrective actions or preventive measures which have been or will be taken, shall be submitted to the appropriate Ohio EPA District Office or local air agency. If no deviations occurred during a calendar quarter, the permittee shall submit a quarterly report, which states that no deviations occurred during that quarter. The reports shall be submitted quarterly, i.e., by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters. (These quarterly reports shall exclude deviations resulting from malfunctions reported in accordance with OAC rule 3745-15-06.)

3. Records Retention Requirements

Each record of any monitoring data, testing data, and support information required pursuant to this permit shall be retained for a period of five years from the date the record was created. Support information shall include, but not be limited to, all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by this permit. Such records may be maintained in computerized form.

4. Inspections and Information Requests

The Director of the Ohio EPA, or an authorized representative of the Director, may, subject to the safety requirements of the permittee and without undue delay, enter upon the premises of this source at any reasonable time for purposes of making inspections, conducting tests, examining records or reports pertaining to any emission of air contaminants, and determining compliance with any applicable State air pollution laws and regulations and the terms and conditions of this permit. The permittee shall furnish to the Director of the Ohio EPA, or an authorized representative of the Director, upon receipt of a written request and within a reasonable time, any

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information that may be requested to determine whether cause exists for modifying, reopening or revoking this permit or to determine compliance with this permit. Upon verbal or written request, the permittee shall also furnish to the Director of the Ohio EPA, or an authorized representative of the Director, copies of records required to be kept by this permit.

5. Scheduled Maintenance/Malfunction Reporting

Any scheduled maintenance of air pollution control equipment shall be performed in accordance with paragraph (A) of OAC rule 3745-15-06. The malfunction of any emissions units or any associated air pollution control system(s) shall be reported to the appropriate Ohio EPA District Office or local air agency in accordance with paragraph (B) of OAC rule 3745-15-06. Except as provided in that rule, any scheduled maintenance or malfunction necessitating the shutdown or bypassing of any air pollution control system(s) shall be accompanied by the shutdown of the emissions unit(s) that is (are) served by such control system(s).

6. Permit Transfers

Any transferee of this permit shall assume the responsibilities of the prior permit holder. The appropriate Ohio EPA District Office or local air agency must be notified in writing of any transfer of this permit.

7. Air Pollution Nuisance

The air contaminants emitted by the emissions units covered by this permit shall not cause a public nuisance, in violation of OAC rule 3745-15-07.

8. Termination of Permit to Install

This Permit to Install shall terminate within eighteen months of the effective date of the Permit to Install if the owner or operator has not undertaken a continuing program of installation or modification or has not entered into a binding contractual obligation to undertake and complete within a reasonable time a continuing program of installation or modification. This deadline may be extended by up to 12 months if application is made to the Director within a reasonable time before the termination date and the party shows good cause for any such extension.

9. Construction of New Sources(s)

The proposed emissions unit(s) shall be constructed in strict accordance with the plans and application submitted for this permit to the Director of the Ohio Environmental Protection Agency. There may be no deviation from the approved plans without the express, written approval of the Agency. Any deviations from the approved plans or the above conditions may lead to such sanctions and penalties as provided under Ohio law. Approval of these plans does not constitute an assurance that the proposed facilities will operate in compliance with all Ohio laws and regulations. Additional

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facilities shall be installed upon orders of the Ohio Environmental Protection Agency if the proposed sources cannot meet the requirements of this permit or cannot meet applicable standards.

If the construction of the proposed emissions unit(s) has already begun or has been completed prior to the date the Director of the Environmental Protection Agency approves the permit application and plans, the approval does not constitute expressed or implied assurance that the proposed facility has been constructed in accordance with the approved plans. The action of beginning and/or completing construction prior to obtaining the Director's approval constitutes a violation of OAC rule 3745-31-02. Furthermore, issuance of the Permit to Install does not constitute an assurance that the proposed source will operate in compliance with all Ohio laws and regulations. Approval of the plans in any case is not to be construed as an approval of the facility as constructed and/or completed. Moreover, issuance of the Permit to Install is not to be construed as a waiver of any rights that the Ohio Environmental Protection Agency (or other persons) may have against the applicant for starting construction prior to the effective date of the permit. Additional facilities shall be installed upon orders of the Ohio Environmental Protection Agency if the proposed facilities cannot meet the requirements of this permit or cannot meet applicable standards.

10. Public Disclosure

The facility is hereby notified that this permit, and all agency records concerning the operation of this permitted source, are subject to public disclosure in accordance with OAC rule 3745-49-03.

11. Applicability

This Permit to Install is applicable only to the emissions unit(s) identified in the Permit to Install. Separate application must be made to the Director for the installation or modification of any other emissions unit(s).

12. Best Available Technology

As specified in OAC Rule 3745-31-05, all new sources must employ Best Available Technology (BAT). Compliance with the terms and conditions of this permit will fulfill this requirement.

13. Source Operation and Operating Permit Requirements After Completion of Construction

- a. If the permittee is required to apply for a Title V permit pursuant to OAC Chapter 3745-77, the permittee shall submit a complete Title V permit application or a complete Title V permit modification application within twelve (12) months after commencing operation of the emissions units covered by this permit. However, if the proposed new or

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modified source(s) would be prohibited by the terms and conditions of an existing Title V permit, a Title V permit modification must be obtained before the operation of such new or modified source(s) pursuant to OAC rule 3745-77-04(D) and OAC rule 3745-77-08(C)(3)(d).

- b. If the permittee is required to apply for permit(s) pursuant to OAC Chapter 3745-35, the source(s) identified in this Permit To Install is (are) permitted to operate for a period of up to one year from the date the source(s) commenced operation. Permission to operate is granted only if the facility complies with all requirements contained in this permit and all applicable air pollution laws, regulations, and policies. Pursuant to OAC Chapter 3745-35, the permittee shall submit a complete operating permit application within thirty (30) days after commencing operation of the source(s) covered by this permit.

14. Construction Compliance Certification

The applicant shall provide Ohio EPA with a written certification (see enclosed form) that the facility has been constructed in accordance with the Permit to Install application and the terms and conditions of the Permit to Install. The certification shall be provided to Ohio EPA upon completion of construction but prior to startup of the source.

15. Fees

The permittee shall pay fees to the Director of the Ohio EPA in accordance with ORC section 3745.11 and OAC Chapter 3745-78. The permittee shall pay all applicable Permit to Install fees within 30 days after the issuance of this Permit to Install.

B. Permit to Install Summary of Allowable Emissions

The following information summarizes the total allowable emissions, by pollutant, based on the individual allowable emissions of each air contaminant source identified in this permit.

SUMMARY (for informational purposes only) TOTAL PERMIT TO INSTALL ALLOWABLE EMISSIONS

<u>Pollutant</u>	<u>Tons Per Year</u>
PM	12.6
PM ₁₀	9.5
VOC	6.3
SO ₂	15.4
NO _x	21.0
CO	70.0

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Issue

Facility ID: 1431443377

Emissions Unit ID: P901

PART II - SPECIAL TERMS AND CONDITIONS FOR SPECIFIC EMISSIONS UNIT(S)

A. Applicable Emissions Limitations and/or Control Requirements

- 1. The specific operations(s), property, and/or equipment which constitute this emissions unit are listed in the following table along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from this unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>
P901 - 420 Tons/Hr Asphaltic Concrete Batch Plant - Modification	OAC rule 3745-31-05 (A)(3)
	40 CFR Part 60, Subpart I
	OAC rule 3745-17-07 (A)
	OAC rule 3745-17-07 (B)
	OAC rule 3745-17-08(B)
	OAC rule 3745-31-05 (D) Synthetic Minor to avoid PSD and Title V

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Emissions Unit ID: P901

OAC rule 3745-17-11

<u>Applicable Emissions Limitations/Control Measures</u>	emissions
12.6 lbs. PM/hr. from fugitive emissions	4.73 TPY* PM10 from fugitive emissions
11.34 lbs. PM10/hr. from fugitive emissions	0.04 grain PM per dry standard cubic foot of exhaust gases.
17.6 lbs. PM/hr from stack emissions	The opacity emission limitation specified by this rule is less stringent than the opacity emission limitation established pursuant to OAC rule 3745-31-05 (A)(3).
11.34 lbs/ PM-10/hr from stack emissions	The emission limitation specified by this rule is less stringent than the emission limitation established pursuant to OAC rule 3745-31-05 (A)(3).
168 lbs. CO/hr 50.4 lbs. NOx/hr, 21.0 TPY* NOx 37.0 lbs. SO2/hr, 15.4 TPY* SO2 15.1 lbs. VOC/hr, 6.3 TPY* VOC	Visible particulate emissions of fugitive dust shall not exceed 20 percent opacity, as a 3-minute average.
See term A.2.b., A.2.e and A.2.f	
See term B.2.	
The requirements of this rule also include compliance with the requirements of 40 CFR Part 60 Subpart I, OAC rule 3745-17-07 (B) , OAC rule 3745-17-08(B) and OAC rule 3745-31-05(D).	Use of adequate enclosures and sufficient draft to minimize or eliminate visible emissions of fugitive dust from the hot aggregate elevator, vibrating screens, and weigh hopper.
70.0 TPY* CO	The drop height of the front end loader bucket shall be minimized to the extent possible in order to minimize or eliminate visible emissions of fugitive dust from the elevator loading area.
7.35 TPY* PM from stack emissions	
5.25 TPY* PM from fugitive emissions	
4.73 TPY* PM10 from stack	The aggregate loaded into the storage bins shall have a moisture content

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flash point	100°F, minimum
heat content	135,000 Btu/gallon, minimum
sulfur content	0.50%

* If the permittee is burning used oil with any quantifiable level (2 ppm) of PCB's, then the permittee is subject to the notification requirements of 40 CFR 279.62.

- 2.f** Used oil containing more than 1000 ppm total halogens is presumed to be a hazardous waste under the rebuttable presumption provided under 40 CFR Part 266.40(c) and OAC rule 3745-279. Therefore, the permittee may receive and burn used oil exceeding 1000 ppm of total halogens (but less than 4000 ppm, maximum) only if the supplier ["marketer" in 40 Part CFR 266.43(a)] has demonstrated to the Ohio EPA's Division of Hazardous Waste Management that the used oil does not contain any hazardous waste.

B. Operational Restrictions

1. The pressure drop across the baghouse shall be maintained within a range of 2 inches of water to 8 inches of water while the emissions unit is in operation.
2. The maximum annual asphalt production rate for this emissions unit shall not exceed 350,000 tons per year as a rolling, 12-month summation of the production rates.

The permittee shall comply with the rolling 12-month production limitation immediately upon startup under this permit based on past records of monthly production.

3. The use of recycled asphalt product (RAP) shall be limited to 50 percent for surface, base, and intermediate mixes.
4. The permittee may not receive or burn any used oil which does not meet the specifications listed in this permit without first obtaining a permit to install that authorizes the burning of such used oil.

C. Monitoring and/or Recordkeeping Requirements

1. The permittee shall properly install, operate, and maintain equipment to monitor the pressure drop across the baghouse while the emissions unit is in operation. The monitoring equipment shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and operating manual(s). The permittee shall record the pressure drop across the baghouse on daily basis.
2. The permittee shall maintain monthly records of the following information:

- a. The production rate for each month.
 - b. The updated rolling, 12-month summation of the production rates.
3. The permittee shall receive a chemical analysis with each shipment of used oil from the supplier. The analysis shall identify the name and address of the supplier, the supplier's USEPA identification number, and the following information:
- a. The date of shipment or delivery.
 - b. The quantity of used oil received (gallons).
 - c. The Btu value of the used oil, in BTU/gallon.
 - d. The flash point of the used oil in degrees F.
 - e. The arsenic content, in ppm.
 - f. The cadmium content, in ppm.
 - g. The chromium content, in ppm.
 - h. The lead content, in ppm.
 - i. The PCB content, in ppm.
 - j. The total halogen content, in ppm.
 - k. The mercury content, in ppm.

Each analysis shall be kept in a readily accessible location for at least 5 years and shall be made available to the Director (the appropriate Ohio EPA District Office or local air agency) upon verbal or written request. The Director or any authorized representative of the Director may require or may conduct periodic, detailed chemical analyses through an independent laboratory of any used oil shipment received by this facility, of any used oil stored at this facility, or of any used oil sampled at the dryer.

4. For each shipment of oil received for burning in this emissions unit, the permittee shall maintain records of the total quantity of oil received and the permittee's or oil supplier's analyses for sulfur content and heat content.

D. Reporting Requirements

1. The permittee shall submit pressure drop deviation (excursion) reports that identify all periods of time during which the pressure drop across the baghouse did not comply with the allowable range specified in term B.1.
2. The permittee shall submit annual reports which specify the total SO₂, CO, NO_x and PM emissions from this emissions unit for the previous calendar year. These reports shall be submitted by January 31 of each year.
3. The permittee shall submit deviation (excursion) reports that identify all exceedances of the rolling, 12-month asphalt production rate limitation.

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4. The deviation reports shall be submitted in accordance with the reporting requirements of the General Terms and Conditions of this permit.
5. The permittee shall notify the USEPA and the Ohio EPA if any of the used oil exceeds the used oil specifications found in OAC rule 3745-279-11 or term A.2.e. If the permittee is burning used oil which exceeds the specifications found in OAC rule 3745-279-11, the permittee is subject to that rule and must comply with all provisions of that rule.
6. Pursuant to the NSPS, the source owner/operator is hereby advised of the requirement to report the following at the appropriate times:
 - a. Construction date (no later than 30 days after such date);
 - b. Anticipated start-up date (not more than 60 days or less than 30 days prior to such date);
 - c. Actual start-up date (within 15 days after such date); and
 - d. Date of performance testing (if required, at least 30 days prior to testing).

Reports are to be sent to:

Ohio Environmental Protection Agency
DAPC - Permit Management Unit
P. O. Box 163669
Columbus, Ohio 43216-3669

and

Hamilton County Department of Environmental Services
250 William Howard Taft Road
Cincinnati, Ohio 45219

7. The permittee shall submit deviation (excursion) reports that identify all shipments of oil which did not comply with the allowable sulfur limit in term A.2.e.

E. Testing Requirements

1. Compliance with the visible particulate emissions limitations in term A.1 and A.2 shall be demonstrated by using Method 9, 40 CFR Part 60 Subpart A.
2. Compliance with the CO, NO_x, SO₂ and VOC emissions limitations will be demonstrated by

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Issue**Facility ID: 1431443377**

Emissions Unit ID: P901

multiplying the production rate recorded in Term C.2 with the emission factors from AP-42, Table 11.1-5 and 11.1-6 12/00):

CO emissions = 0.40 lb/ton produced
 NO_x emissions = 0.12 lb/ton produced
 SO₂ emissions = 0.088 lb/ton produced
 VOC emissions = 0.036 lb/ton produced

3. Compliance with the annual asphalt production limit in term B.2 shall be demonstrated by the record keeping in term C.2.
4. Compliance with the baghouse pressure drop limitation in term B.1 shall be demonstrated by the recordkeeping in term C.1.
5. Compliance with the used oil specifications shall be demonstrated by the chemical analysis which is submitted with each shipment from the supplier.
6. The permittee shall conduct, or have conducted, emission testing for this emissions unit in accordance with the following requirements:
 - a. The emission testing shall be conducted within 60 days after achieving the maximum production rate but not later than 180 days after initial startup of the emissions unit.
 - b. The emission testing shall be conducted to demonstrate compliance with the particulate, carbon monoxide, nitrogen oxide and volatile organic compound emission limits.
 - c. The following test method(s) shall be employed to demonstrate compliance with the allowable mass emission rate(s): for particulate, Method 5 of 40 CFR Part 60, Appendix A, for organic compounds, Method 25 of 40 CFR Part 60, Appendix A- if applicable, for NO_x, Method 7 of 40 CFR Part 60, Appendix A and for CO, Method 10 of 40 CFR Part 60, Appendix A. Alternative U.S. EPA approved test methods may be used with prior approval from the Hamilton County Department of Environmental Services.
 - d. The test(s) shall be conducted while the emissions unit is operating at or near its maximum capacity, unless otherwise specified or approved by the Hamilton County Department of Environmental Services.

Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the Hamilton County Department of Environmental Services. The "Intent to Test" notification shall describe in detail the proposed test methods and procedures, the emissions unit operating parameters, the time(s) and date(s) of the test(s), and the person(s) who will be conducting the test(s). Failure to submit such notification for review and approval prior to the test(s) may result in the Hamilton County Department of Environmental Services refusal to accept the results of the emission test(s).

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Emissions Unit ID: P901

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Personnel from the Hamilton County Department of Environmental Services shall be permitted to witness the test(s), examine the testing equipment, and acquire data and information necessary to ensure that the operation of the emissions unit and the testing procedures provide a valid characterization of the emissions from the emissions unit and/or the performance of the control equipment.

A comprehensive written report on the results of the emissions test(s) shall be signed by the person or persons responsible for the tests and submitted to the Hamilton County Department of Environmental Services within 30 days following completion of the test(s). The permittee may request additional time for the submittal of the written report, where warranted, with prior approval from the Hamilton County Department of Environmental Services.

F. Miscellaneous Requirements

1. The terms and conditions listed in this permit to install shall supercede all the air pollution control requirements for this emission unit contained in permit to install 14-04951 as issued on December 19, 2000.
2. The following terms and conditions of this permit are federally enforceable: A., B.1- B.4, C.1- C.4., D.1 - D.7 and E.1 - E.6.
3. Modeling to demonstrate compliance with the Ohio EPA's "Air Toxic Policy" was not necessary because the emissions unit's maximum annual emissions for each toxic compound will be less than 1.0 ton. OAC Chapter 3745-31 requires permittees to apply for and obtain a new or modified permit to install prior to making a "modification" as defined by OAC rule 3745-31-01. The permittee is hereby advised that changes in the composition of the materials, or use of new materials, that would cause the emissions of any pollutant that has a listed TLV to increase to above 1.0 ton per year may require the permittee to apply for and obtain a new permit to install.

NEW SOURCE REVIEW FORM B

PTI Number: 14-05067 Facility ID: 1431443377

FACILITY NAME Shelly Materials - Plant 45

FACILITY DESCRIPTION Adding used oil and No. 2 fuel oil for as fuel sources for the batch plant. CITY/TWP Cincinnati

SIC CODE 2951 SCC CODE 3-05-011-10 EMISSIONS UNIT ID P901

EMISSIONS UNIT DESCRIPTION 420 Tons/Hr Asphaltic Concrete Batch Plant - Modification

DATE INSTALLED 1989

EMISSIONS: (Click on bubble help for Air Quality Descriptions)

Pollutants	Air Quality Description	Actual Emissions Rate		PTI Allowable	
		Short Term Rate	Tons Per Year	Short Term Rate	Tons Per Year
Particulate Matter	Attainment			30.30	12.6
PM ₁₀	Attainment			22.70	9.5
Sulfur Dioxide	Attainment			36.96	15.4
Organic Compounds	Attainment			15.12	6.3
Nitrogen Oxides	Attainment			50.40	21.0
Carbon Monoxide	Attainment			168.00	70.0
Lead					
Other: Air Toxics					

APPLICABLE FEDERAL RULES:

NSPS? 40 CFR 60

NESHAP?

PSD?

OFFSET POLICY?

Subpart I

WHAT IS THE BAT DETERMINATION, AND WHAT IS THE BASIS FOR THE DETERMINATION?

BAT is satisfied through the use of a baghouse, compliance with 40 CFR Part 60 Subpart I, visible emission limitations and production limits.

IS THIS SOURCE SUBJECT TO THE AIR TOXICS POLICY? No

OPTIONAL: WHAT IS THE CAPITAL COST OF CONTROL EQUIPMENT?

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TOXIC AIR CONTAMINANTS

Ohio EPA's air toxics policy applies to contaminants for which the American Conference of Governmental Industrial Hygienists (ACGIH) has a listed threshold limit value.

AIR TOXICS MODELING PERFORMED*? _____ YES X NO

IDENTIFY THE AIR CONTAMINANTS: _____

NEW SOURCE REVIEW FORM B

PTI Number: 14-05067 Facility ID: 1431443377

FACILITY NAME Shelly Materials - Plant 45

FACILITY DESCRIPTION Adding used oil and No. 2 fuel oil for as fuel sources for the batch plant. CITY/TWP Cincinnati

Ohio EPA Permit to Install Information Form Please describe below any documentation which is being submitted with this recommendation (must be sent the same day). Electronic items should be submitted with the e-mail transmitting the PTI terms, and in software that CO can utilize. If mailing any hard copy, this section must be printed as a cover page. All items must be clearly labeled indicating the PTI name and number. Submit **hard copy items to Pam McGraner**, AQM&P, DAPC, Central Office, and electronic files to **airpti@epa.state.oh.us**

Please fill out the following. If the checkbox does not work, replace it with an 'X'

	<u>Electronic</u>	<u>Additional information File Name Convention (your PTI # plus this letter)</u>	<u>Hard Copy</u>	<u>None</u>
<u>Calculations (required)</u>	<input type="checkbox"/>	0000000c.wpd	<input checked="" type="checkbox"/>	
<u>Modeling form/results</u>	<input type="checkbox"/>	0000000s.wpd	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<u>PTI Application (complete or partial)*</u>	<input type="checkbox"/>	0000000a.wpd	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<u>BAT Study</u>	<input type="checkbox"/>	0000000b.wpd	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<u>Other/misc.</u>	<input type="checkbox"/>	0000000t.wpd	<input type="checkbox"/>	<input checked="" type="checkbox"/>

* Mandatory for netting, PSD, nonattainment NSR, 112(g), 21-07(G)(9)(g) and 21-09(U)(2)(f) - 2 complete copies.

Please complete (see comment bubble to the left for additional instructions):

NSR Discussion

Permit Review Narrative
PTI 14-05067

Shelly Materials Plant #45
387 Columbia Avenue
Cincinnati, OH 45215

PN: 1431443377
Emissions Unit: P901

Shelly Materials #45 produces asphaltic concrete. This PTI is to enable an existing batch plant to utilize used oil and No. 2 fuel oil. Shelly Materials #45 would still like the option of burning natural gas, which is what they burn presently. The emissions from this plant will be fugitive and stack particulate matter, PM10, SO₂, VOC, NO_x and CO. The OAC rules governing the emissions units are 3745-31-05 (A)(3)(BAT), 3745-31-05(D), 3745-17-07, 3745-17-08, 3745-17-11 and 40 CFR Part 60, Subpart I.

For calculation of actual and potential emissions, see the attached sheets. Hourly emissions are based on a maximum hourly production rate of 420 tons of concrete per hour. Emission factors are from appropriate sections of AP-42 for the asphaltic concrete batch plant.

The PTI will limit emissions to 12.6 TPY PM, 9.5 TPY PM-10, 6.3 TPY VOC, 15.4 TPY SO₂, 21.0 TPY NO_x and 70.0 TPY CO.

BAT for P901 is demonstrated by the use of a baghouse, compliance with 40 CFR Part 60 Subpart I, visible emission limitations and production limits.

NEW SOURCE REVIEW FORM B

PTI Number: 14-05067 Facility ID: 1431443377

FACILITY NAME Shelly Materials - Plant 45

FACILITY DESCRIPTION	Adding used oil and No. 2 fuel oil for as fuel sources for the batch plant.	CITY/TWP	Cincinnati
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The emissions unit will be in compliance with the applicable rules and a draft Permit to Install should be issued.

This permit will be a modification of PTI 14-04951 which was just issued on 12/19/00.

The permit fee is \$1000.00 - P901 Concrete Batch Plant (based on PWR of 420 tons per hour).

Total: \$1000.00

Prepared by: Chad Powell

Date prepared: January 12, 2001

Please complete for these type permits (For PSD/NSR Permit, place mouse over this text):

Synthetic Minor Determination and/or **Netting Determination**

Synthetic Minor Determination

Barrett Paving Materials

PTI 14-04937

A. Source Description

Shelly Materials #45 has submitted a Permit to Install application (PTI 14-05067) to allow them to burn used oil and No.2 fuel oil in the asphalt concrete batch plant. They currently use natural gas and would still like to be able to burn it in the future.

B. Facility Emissions and Attainment Status

This facility is located in Hamilton County, Ohio and is presently a minor facility. Hamilton County is classified as attainment for all pollutants.

C. Source Emissions

Potential emissions of CO and PM from this emissions unit are above the threshold to be considered a major facility for PSD purposes. Based on maximum capacity and 8,760 hours of operation, the potential emissions would be 58867.20 TPY PM and 8278.2 TPY PM-10 emissions from stack and 735.84 TPY CO. The facility will keep records and submit reports as described in the PTI to ensure compliance with the emission and production limits. They are also required to use a baghouse for control of particulate matter.

The asphalt production limitation will limit stack PM emissions to 7.35 TPY, stack PM-10 emissions to 4.73 TPY and the CO emissions to 70.0 TPY as a rolling, 12-month summation. The facility will maintain monthly records and submit annual reports as described in the PTI to ensure compliance with the production and emission limits.

D. Conclusion

With this permit, the federally enforceable terms require the use of control equipment so that the facility has a potential to emit less than 100 tons per year of CO, PM and PM-10. Shelly Materials #45 will not be considered a major facility for the purpose of Title V permitting. In addition the particulate matter, PM10 and CO emissions will be less than 250 tons per year thus PSD will not apply.

NEW SOURCE REVIEW FORM B

PTI Number: 14-05067 Facility ID: 1431443377

FACILITY NAME Shelly Materials - Plant 45

FACILITY DESCRIPTION	Adding used oil and No. 2 fuel oil for as fuel sources for the batch plant.	CITY/TWP	Cincinnati
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PLEASE PROVIDE ADDITIONAL NOTES OR COMMENTS AS NECESSARY:

NONE

Please complete:

SUMMARY (for informational purposes only)

TOTAL PERMIT TO INSTALL ALLOWABLE EMISSIONS

<u>Pollutant</u>	<u>Tons Per Year</u>
PM	12.6
PM ₁₀	9.5
VOC	6.3
SO ₂	15.4
NO _x	21.0
CO	70.0