



State of Ohio Environmental Protection Agency

**RE: FINAL PERMIT TO INSTALL CERTIFIED MAIL
BUTLER COUNTY**

Street Address:

122 S. Front Street

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

Mailing Address:

Lazarus Gov. Center
P.O. Box 1049

Application No: 14-04891

DATE: 3/22/00

Martin Marietta Materials Incorporated
Katherine A. Hanna
4770 Duke Drive, Suite 200
Mason, OH 45040

Enclosed please find an Ohio EPA Permit to Install which will allow you to install the described source(s) in a manner indicated in the permit. Because this permit contains several conditions and restrictions, I urge you to read it carefully.

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.

You are hereby notified that this action by the Director is final and may be appealed to the Ohio Environmental Review Appeals Commission pursuant to Chapter 3745.04 of the Ohio Revised Code. The appeal must be in writing and set forth the action complained of and the grounds upon which the appeal is based. It must be filed within thirty (30) days after the notice of the Directors action. A copy of the appeal must be served on the Director of the Ohio Environmental Protection Agency within three (3) days of filing with the Commission. An appeal may be filed with the Environmental Review Appeals Commission at the following address:

Environmental Review Appeals Commission
236 East Town Street, Room 300
Columbus, Ohio 43215

Very truly yours,

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

CC: USEPA

HCDES



STATE OF OHIO ENVIRONMENTAL PROTECTION AGENCY

Permit To Install

Issue Date: 3/22/00

FINAL PERMIT TO INSTALL 14-04891

Application Number: 14-04891
APS Premise Number: 1409030125
Permit Fee: **\$700**
Name of Facility: Martin Marietta Materials Incorporated
Person to Contact: Katherine A. Hanna
Address: 4770 Duke Drive, Suite 200
Mason, OH 45040

Location of proposed air contaminant source(s) [emissions unit(s)]:

**107 River Circle
Fairfield, Ohio**

Description of proposed emissions unit(s):

Aggregate processing plant - crushing, screening and material handling.

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

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 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 facilities shall be installed upon orders of the Ohio

Environmental Protection Agency if the proposed sources are inadequate 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 prove to be inadequate 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

This facility is permitted to operate each source described by this Permit to Install for a period of up to one year from the date the source commenced operation. This 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 emissions unit(s) covered by this permit.

14. Construction Compliance Certification

Martin Marietta Materials Incorporated
PTI Application: 14-04891
Issued: 3/22/00

Facility ID: 1409030125

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	54.9
PM 10	26.2

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>	<u>Applicable Emissions Limitations/Control Measures</u>
F001 - Aggregate processing plant	OAC rule 3745-31-05 (A) (3)	46.4 lbs. PM/hour 54.9 TPY PM 21.8 lbs. PM-10/hour 26.2 TPY PM-10
	OAC rule 3745-17-07 (B)	The emission limitation/opacity restriction established by this rule is less stringent than those established by 40 CFR Part 60, Subpart OOO.
	OAC rule 3745-17-08 (B)	The emission limitation(s) established by this rule is less stringent than those established by OAC rule 3745-31-05(A)(3)
	40 CFR Part 60, Subpart OOO	See Terms A.2.2.b, A.2.2.c, A.2.2.d and A.2.2.e.
	OAC rule 3745-15-07	See Part I, term A.7.

2. Additional Terms and Conditions

- 2.a** Compliance with OAC rule 3745-31-05(A)(3) shall be demonstrated by wet-mining the aggregate and the use of water sprays, as necessary, to keep the material moist to meet opacity limitations and the annual production limit.

- 2.b** Fugitive particulate emissions from any transfer point on belt conveyors and from any other emissions point (excluding crushers and truck dumping) where process materials are not saturated, shall not exceed 10 percent opacity, except as provided by rule 40 CFR 60.672.
- 2.c** Fugitive particulate emissions from any crusher shall not exceed 15 percent opacity.
- 2.d** Fugitive particulate emissions from wet screening operations and subsequent screening operations, bucket elevators, and belt conveyors that process saturated material in the production line up to the next crusher, grinding mill or storage bin shall not exceed 0 percent opacity.
- 2.e** Fugitive particulate emissions from screening operations, bucket elevators, and belt conveyors in the production line downstream of wet mining operations, where such screening operations, bucket elevators, and belt conveyors process saturated materials up to the first crusher, grinding mill, or storage bin in the production line shall not exceed 0 percent opacity.
- 2.f** The hourly emission limitations outlined in section A.1. are based upon the emissions unit's potential to emit. Therefore, no hourly records are required to demonstrate compliance with these limits.
- 2.g** The application and enforcement of the provisions of the New Source Performance Standards (NSPS), as promulgated by the United States Environmental Protection Agency, 40 CFR Part 60, are delegated to the Ohio Environmental Protection Agency. The requirements of 40 CFR Part 60 are also federally enforceable.

B. Operational Restrictions

1. Water sprays shall be operated at points necessary to ensure compliance with the visible emission limitations specified in terms A.2.2.b, A.2.2.c, A.2.2.d and A.2.2.e for crushing, transfer points, screening, and conveying operations.
2. Aggregate product loaded onto trucks shall have a moisture content sufficient to minimize visible emissions of fugitive dust and the loading drop height shall not exceed fifteen (15) feet.
3. The maximum amount of aggregate processed in emissions unit F001 shall not exceed 3,000,000 tons per year.

C. Monitoring and/or Recordkeeping Requirements

1. The permittee shall maintain monthly records of the amount of aggregate processed in emissions unit F001.

D. Reporting Requirements

1. A screening operation, bucket elevator, or belt conveyor that processes saturated material and is subject to 40 CFR 60.672(h) and subsequently processes unsaturated material shall submit a report of this change within 30 days following such change to the Hamilton County Department of Environmental Services. This screening operation, bucket elevator, or belt conveyor is then subject to the 10 percent opacity limit in 40 CFR 60.672(b) and the emission test requirements of 40 CFR 60.11 and 60.675. A screening operation, bucket elevator, or belt conveyor that processes unsaturated material but subsequently processes saturated material shall submit a report of this change within 30 days following such change. This screening operation, bucket elevator, or belt conveyor is then subject to the no visible emission limit in 40 CFR 60.672(h).
2. The permittee shall submit annual reports to Hamilton County Department of Environmental Services that identify any exceedances of the annual aggregate production limitation, as well as the corrective actions that were taken to achieve compliance. If no exceedances occurred, then the permittee shall state so in the report. These reports shall be submitted by January 31 of each year.
3. 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), including a description of each affected emissions unit, equipment manufacturer, and serial number of the equipment if available; 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

Martin Marietta Materials Incorporated
PTI Application: 14-04801
Issued

Facility ID: 1409030125

Emissions Unit ID: F001

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

4. The permittee shall submit written reports of the results of all performance tests conducted to demonstrate compliance with the standards in 40 CFR 60.672 of Subpart OOO, including reports of observations using Method 9 to demonstrate compliance with terms A.2.2.b, A.2.2.c, A.2.2.d and A.2.2.e of this permit.
5. The permittee shall submit annual reports which specify the total PM and PM10 emissions from this emissions unit for the previous calendar year. These reports shall be submitted by January 31 of each year.

E. Testing Requirements

1. The permittee shall conduct, or have conducted, fugitive visible emission testing for emissions unit F001 in accordance with the following requirements:
 - a. The emission testing shall be conducted within 60 days after achieving maximum production but no later than 180 days after the modification.
 - b. The emission testing shall be conducted to demonstrate compliance with 40 CFR 60 Subpart OOO;
 - c. Compliance with the opacity limits of this permit shall be determined by using US EPA Reference Test Method 9. The minimum distance between the observer and the emission source shall be 4.57 meters (15 feet).
 - 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 appropriate Ohio EPA District Office or local air agency;

Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the appropriate Ohio EPA District Office or local air agency.

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 Ohio EPA District Office's or local air agency's refusal to accept the results of the emission test(s).

Personnel from the appropriate Ohio EPA District Office or local air agency 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 appropriate Ohio EPA District Office or local air agency within 30 days following completion of the test(s).

2. Compliance with the production limitation in term B.3 of these terms and conditions shall be demonstrated by the recordkeeping in term C.1.
3. Compliance with the lbs/hr and TPY PM and PM10 emission limitations in section A.1. shall be demonstrated by calculations using the emission factors (EF) from AP-42, Table 11.19.2-2, Fifth Edition, 1995.

F. Miscellaneous Requirements

1. The permittee shall comply with all applicable miscellaneous requirements of 40 CFR 60, Subpart OOO.

NEW SOURCE REVIEW FORM B

PTI Number: 14-04891 Facility ID: 1409030125

FACILITY NAME Martin Marietta Materials Incorporated

FACILITY DESCRIPTION Aggregate processing plant - crushing, screening and material handling CITY/TWP Fairfield

SIC CODE 1440 SCC CODE 3-05-020-01 EMISSIONS UNIT ID F001

EMISSIONS UNIT DESCRIPTION Aggregate processing plant

DATE INSTALLED 7/00

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	46.4	54.9	46.4	54.9
PM ₁₀	attainment	21.8	26.2	21.8	26.2
Sulfur Dioxide					
Organic Compounds					
Nitrogen Oxides					
Carbon Monoxide					
Lead					
Other: Air Toxics					

APPLICABLE FEDERAL RULES:

NSPS? Subpart OOO NESHAP? PSD? OFFSET POLICY?

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

BAT is satisfied by the processing of wet-mined aggregate, the use of water sprays to keep materials moist, aggregate production limits and opacity limitations.

IS THIS SOURCE SUBJECT TO THE AIR TOXICS POLICY? No

OPTIONAL: WHAT IS THE CAPITAL COST OF CONTROL EQUIPMENT? \$

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: NA

NEW SOURCE REVIEW FORM B

PTI Number: 14-04891 Facility ID: 1409030125

FACILITY NAME Martin Marietta Materials Incorporated

FACILITY DESCRIPTION	Aggregate processing plant - crushing, screening and material handling	CITY/TWP	Fairfield
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Please describe any hard copy information is being submitted with this recommendation (Please send hard copy information to Pam McGraner, DAPC Central Office - Air Quality Modeling and Planning):

NONE

Please provide any additional permit specific notes as you deem necessary:

Permit Review Narrative

PTI 14-04891

Martin Marietta Materials, Inc.
107 River Circle
Fairfield, OH 45014
PN: 1409030125

Martin Marietta Materials, Inc. produces sand and gravel products, which are principally used in construction projects.

This facility, also known as Fairfield Sand and Gravel, wet mines the aggregate by dredging the onsite quarry. The aggregate processing plant is an existing emissions unit and no permit to install (PTI) has been issued for this facility. Permits to operate (PTO) have been issued for the aggregate processing plant and the roadways, emissions units F001 and F002 respectively.

Permit to Install (PTI) application 14-04891 is a modification to emissions unit F001, the aggregate processing plant, at the Fairfield Sand and Gravel plant. Twenty-one new aggregate conveyors, four feeders and three screens will be added to the aggregate processing plant. As a result of additional conveyor transfer points, an increase in particulate emissions will occur. Particulate emissions are expected to be minor since the material being processed is wet mined.

The applicable NSPS rule for emissions unit F001 is 40 CFR Part 60, Subpart OOO. The OAC rules governing this emissions unit are 3745-31-05(A)(3) (Best Available Technology, BAT) and 3745-15-07 (Air pollution nuisances prohibited). Since this plant is located in an Appendix A area, OAC rules 3745-17-07(B) and OAC rule 3745-17-08(B) apply to this emissions unit.

Compliance with OAC rule 3745-31-05 (BAT) shall be demonstrated by wet mining of the aggregate and the use of water sprays to keep the material moist, as necessary, to meet opacity limitations.

Wet-mined aggregate is inherently saturated. Therefore controlled emission factors from AP-42 Table 11.19.2-2 were used for screens and conveyors. Uncontrolled emissions factors were used for the primary and secondary crushers to represent a worst case scenario.

Annual emissions are based on a annual production limit of 3,000,000 tons of aggregate. The lbs/hr allowable emissions limit in this PTI is based on the maximum production rate. Therefore, this permit does not require hourly records.

Since NSPS applies to emissions unit F001, the PTO for emissions unit F001 will remain in Active Status. Direct Final issuance of this PTI is recommended.

NEW SOURCE REVIEW FORM B

PTI Number: 14-04891

Facility ID: 1409030125

FACILITY NAME Martin Marietta Materials Incorporated

FACILITY DESCRIPTION	Aggregate processing plant - crushing, screening and material handling	CITY/TWP	Fairfield
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Permit Fee:\$700.00(Based on maximum process weight rate = 1900 tons/hour.)

Permit To Install Synthetic Minor Write-Up**NONE**

Please fill in the following for this permit:

TOTAL PERMIT TO INSTALL ALLOWABLE EMISSIONS

<u>Pollutant</u>	<u>Tons Per Year</u>
PM	54.9
PM 10	26.2