



Environmental Protection Agency

John R. Kasich, Governor
Mary Taylor, Lt. Governor
Scott J. Nally, Director

9/19/2011

Certified Mail

Mr. Brian Bokovoy
Emerald Performance Materials, LLC
2235 Langdon Farm Rd.
Cincinnati, OH 45237-4712

RE: FINALAIR POLLUTION PERMIT-TO-INSTALL
Facility ID: 1431070039
Permit Number: P0108507
Permit Type: Administrative Modification
County: Hamilton

No	TOXIC REVIEW
No	PSD
Yes	SYNTHETIC MINOR TO AVOID MAJOR NSR
No	CEMS
No	MACT/GACT
No	NSPS
No	NESHAPS
No	NETTING
No	MAJOR NON-ATTAINMENT
No	MODELING SUBMITTED
No	MAJOR GHG
No	SYNTHETIC MINOR TO AVOID MAJOR GHG

Dear Permit Holder:

Enclosed please find a final Air Pollution Permit-to-Install (PTI) which will allow you to install or modify the described emissions unit(s) in a manner indicated in the permit. Because this permit contains several conditions and restrictions, we urge you to read it carefully. Please complete a survey at www.epa.ohio.gov/dapc/permitsurvey.aspx and give us feedback on your permitting experience. We value your opinion.

The issuance of this PTI is a final action of the Director and may be appealed to the Environmental Review Appeals Commission pursuant to Section 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. The appeal must be filed with the Commission within thirty (30) days after notice of the Director's action. The appeal must be accompanied by a filing fee of \$70.00, made payable to "Ohio Treasurer Josh Mandel," which the Commission, in its discretion, may reduce if by affidavit you demonstrate that payment of the full amount of the fee would cause extreme hardship. Notice of the filing of the appeal shall be filed with the Director within three (3) days of filing with the Commission. Ohio EPA requests that a copy of the appeal be served upon the Ohio Attorney General's Office, Environmental Enforcement Section. An appeal may be filed with the Environmental Review Appeals Commission at the following address:

Environmental Review Appeals Commission
309 South Fourth Street, Room 222
Columbus, OH 43215

The Ohio EPA is encouraging 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 Compliance Assistance and Pollution Prevention at (614) 644-3469. If you have any questions regarding this permit, please contact the Hamilton County Dept. of Environmental Services. This permit can be accessed electronically on the Division of Air Pollution Control (DAPC) Web page, www.epa.ohio.gov/dapc by clicking the "Issued Air Pollution Control Permits" link.

Sincerely,

Michael W. Ahern, Manager
Permit Issuance and Data Management Section, DAPC

Cc: U.S. EPA
HCDOES; Indiana; Kentucky



FINAL

Division of Air Pollution Control
Permit-to-Install
for
Emerald Performance Materials, LLC

Facility ID: 1431070039
Permit Number: P0108507
Permit Type: Administrative Modification
Issued: 9/19/2011
Effective: 9/19/2011



Division of Air Pollution Control
Permit-to-Install
for
Emerald Performance Materials, LLC

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Authorization

Facility ID: 1431070039
Facility Description: Manufacturer of Dyes and Pigments
Application Number(s): M0001336
Permit Number: P0108507
Permit Description: Agency-initiated Administrative Modification to PTI 14-06047 for emission units P512 and P513 to establish BAT and conform with the July 2, 2010, memo "Permit Processing After U.S. District Court <10 Ton/Yr Exemption Decision"
Permit Type: Administrative Modification
Permit Fee: \$0.00
Issue Date: 9/19/2011
Effective Date: 9/19/2011

This document constitutes issuance to:

Emerald Performance Materials, LLC
2235 Langdon Farm Rd.
Cincinnati, OH 45237-4712

of a Permit-to-Install for the emissions unit(s) identified on the following page.

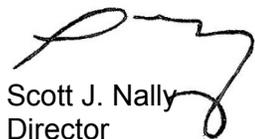
Ohio EPA District Office or local air agency responsible for processing and administering your permit:

Hamilton County Dept. of Environmental Services
250 William Howard Taft Pkwy.
Cincinnati, OH 45219-2660
(513)946-7777

The above named entity is hereby granted a Permit-to-Install for the emissions unit(s) listed in this section 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 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



Scott J. Nally
Director



Authorization (continued)

Permit Number: P0108507

Permit Description: Agency-initiated Administrative Modification to PTI 14-06047 for emission units P512 and P513 to establish BAT and conform with the July 2, 2010, memo "Permit Processing After U.S. District Court <10 Ton/Yr Exemption Decision"

Permits for the following Emissions Unit(s) or groups of Emissions Units are in this document as indicated below:

Emissions Unit ID:

Company Equipment ID:
Superseded Permit Number:
General Permit Category and Type:

P512

Oil-based carbon dispersion process
14-06047
Not Applicable

Emissions Unit ID:

Company Equipment ID:
Superseded Permit Number:
General Permit Category and Type:

P513

Water-based carbon dispersion train
14-06047
Not Applicable

A. Standard Terms and Conditions

1. Federally Enforceable Standard Terms and Conditions

- a) All Standard Terms and Conditions are federally enforceable, with the exception of those listed below which are enforceable under State law only:
- (1) Standard Term and Condition A.2.a), Severability Clause
 - (2) Standard Term and Condition A.3.c) through A. 3.e) General Requirements
 - (3) Standard Term and Condition A.6.c) and A. 6.d), Compliance Requirements
 - (4) Standard Term and Condition A.9., Reporting Requirements
 - (5) Standard Term and Condition A.10., Applicability
 - (6) Standard Term and Condition A.11.b) through A.11.e), Construction of New Source(s) and Authorization to Install
 - (7) Standard Term and Condition A.14., Public Disclosure
 - (8) Standard Term and Condition A.15., Additional Reporting Requirements When There Are No Deviations of Federally Enforceable Emission Limitations, Operational Restrictions, or Control Device Operating Parameter Limitations
 - (9) Standard Term and Condition A.16., Fees
 - (10) Standard Term and Condition A.17., Permit Transfers

2. Severability Clause

- a) A determination that any term or condition of this permit is invalid shall not invalidate the force or effect of any other term or condition thereof, except to the extent that any other term or condition depends in whole or in part for its operation or implementation upon the term or condition declared invalid.
- b) All terms and conditions designated in parts B and C of this permit are federally enforceable as a practical matter, if they are required under the Act, or any of its applicable requirements, including relevant provisions designed to limit the potential to emit of a source, are enforceable by the Administrator of the U.S. EPA and the State and by citizens (to the extent allowed by section 304 of the Act) under the Act. Terms and conditions in parts B and C of this permit shall not be federally enforceable and shall be enforceable under State law only, only if specifically identified in this permit as such.

3. General Requirements

- a) The permittee must comply with all terms and conditions of this permit. Any noncompliance with the federally enforceable terms and conditions of this permit constitutes a violation of the Act, and is grounds for enforcement action or for permit revocation, revocation and re-issuance, or modification.

- b) It shall not be a defense for the permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the federally enforceable terms and conditions of this permit.
- c) This permit may be modified, revoked, or revoked and reissued, for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or revocation, or of a notification of planned changes or anticipated noncompliance does not stay any term and condition of this permit.
- d) This permit does not convey any property rights of any sort, or any exclusive privilege.
- e) 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 or revoking this permit or to determine compliance with this permit. Upon request, the permittee shall also furnish to the Director or an authorized representative of the Director, copies of records required to be kept by this permit. For information claimed to be confidential in the submittal to the Director, if the Administrator of the U.S. EPA requests such information, the permittee may furnish such records directly to the Administrator along with a claim of confidentiality.

4. Monitoring and Related Record Keeping and Reporting Requirements

- a) Except as may otherwise be provided in the terms and conditions for a specific emissions unit, the permittee shall maintain records that include the following, where applicable, for any required monitoring under this permit:
 - (1) The date, place (as defined in the permit), and time of sampling or measurements.
 - (2) The date(s) analyses were performed.
 - (3) The company or entity that performed the analyses.
 - (4) The analytical techniques or methods used.
 - (5) The results of such analyses.
 - (6) The operating conditions existing at the time of sampling or measurement.
- b) 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.
- c) Except as may otherwise be provided in the terms and conditions for a specific emissions unit, the permittee shall submit required reports in the following manner:
 - (1) Reports of any required monitoring and/or recordkeeping of federally enforceable information shall be submitted to the Hamilton County Dept. of Environmental Services.

- (2) Quarterly written reports of (i) any deviations from federally enforceable emission limitations, operational restrictions, and control device operating parameter limitations, excluding deviations resulting from malfunctions reported in accordance with OAC rule 3745-15-06, that have been detected by the testing, monitoring and recordkeeping requirements specified in this permit, (ii) the probable cause of such deviations, and (iii) any corrective actions or preventive measures taken, shall be made to the Hamilton County Dept. of Environmental Services. The written reports shall be submitted (i.e., postmarked) quarterly, by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters. See A.15. below if no deviations occurred during the quarter.
 - (3) Written reports, which identify any deviations from the federally enforceable monitoring, recordkeeping, and reporting requirements contained in this permit shall be submitted (i.e., postmarked) to the Hamilton County Dept. of Environmental Services every six months, by January 31 and July 31 of each year for the previous six calendar months. If no deviations occurred during a six-month period, the permittee shall submit a semi-annual report, which states that no deviations occurred during that period.
 - (4) This permit is for an emissions unit located at a Title V facility. Each written report shall be signed by a responsible official certifying that, based on information and belief formed after reasonable inquiry, the statements and information in the report are true, accurate, and complete.
- d) The permittee shall report actual emissions pursuant to OAC Chapter 3745-78 for the purpose of collecting Air Pollution Control Fees.

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, i.e., upset, of any emissions units or any associated air pollution control system(s) shall be reported to the Hamilton County Dept. of Environmental Services in accordance with paragraph (B) of OAC rule 3745-15-06. (The definition of an upset condition shall be the same as that used in OAC rule 3745-15-06(B)(1) for a malfunction.) The verbal and written reports shall be submitted pursuant to 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 emission unit(s) that is (are) served by such control system(s).

6. Compliance Requirements

- a) The emissions unit(s) identified in this Permit shall remain in full compliance with all applicable State laws and regulations and the terms and conditions of this permit.
- b) Any document (including reports) required to be submitted and required by a federally applicable requirement in this permit shall include a certification by a responsible official that, based on information and belief formed after reasonable inquiry, the statements in the document are true, accurate, and complete.



- c) Upon presentation of credentials and other documents as may be required by law, the permittee shall allow the Director of the Ohio EPA or an authorized representative of the Director to:
 - (1) At reasonable times, enter upon the permittee's premises where a source is located or the emissions-related activity is conducted, or where records must be kept under the conditions of this permit.
 - (2) Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit, subject to the protection from disclosure to the public of confidential information consistent with ORC section 3704.08.
 - (3) Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit.
 - (4) As authorized by the Act, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the permit and applicable requirements.
- d) The permittee shall submit progress reports to the Hamilton County Dept. of Environmental Services concerning any schedule of compliance for meeting an applicable requirement. Progress reports shall be submitted semiannually or more frequently if specified in the applicable requirement or by the Director of the Ohio EPA. Progress reports shall contain the following:
 - (1) Dates for achieving the activities, milestones, or compliance required in any schedule of compliance, and dates when such activities, milestones, or compliance were achieved.
 - (2) An explanation of why any dates in any schedule of compliance were not or will not be met, and any preventive or corrective measures adopted.

7. Best Available Technology

As specified in OAC Rule 3745-31-05, new sources that must employ Best Available Technology (BAT) shall comply with the Applicable Emission Limitations/Control Measures identified as BAT for each subject emissions unit.

8. 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.

9. Reporting Requirements

The permittee shall submit required reports in the following manner:

- a) Reports of any required monitoring and/or recordkeeping of state-only enforceable information shall be submitted to the Hamilton County Dept. of Environmental Services.
- 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 state-only required 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 Hamilton County Dept. of Environmental Services. 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 (i.e., postmarked) quarterly, 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.)

10. 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).

11. Construction of New Sources(s) and Authorization to Install

- a) This permit does not constitute an assurance that the proposed source will operate in compliance with all Ohio laws and regulations. This permit does not constitute expressed or implied assurance that the proposed facility has been constructed in accordance with the application and terms and conditions of this permit. 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 this permit does not constitute an assurance that the proposed source will operate in compliance with all Ohio laws and regulations. Issuance of this permit 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.
- b) If applicable, authorization to install any new emissions unit included in this permit shall terminate within eighteen months of the effective date of the permit if the owner or operator has not undertaken a continuing program of installation or has not entered into a binding contractual obligation to undertake and complete within a reasonable time a continuing program of installation. 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.
- c) The permittee may notify Ohio EPA of any emissions unit that is permanently shut down (i.e., the emissions unit has been physically removed from service or has been altered in such a way that it can no longer operate without a subsequent "modification" or "installation" as defined in OAC Chapter 3745-31) by submitting a certification from the authorized official that identifies the date on which the emissions unit was permanently shut down. Authorization to operate the affected emissions unit shall cease upon the date certified by the authorized official that the emissions unit was permanently shut down. At a minimum, notification of permanent shut down shall be made or confirmed by marking the affected emissions unit(s) as "permanently shut down" in Ohio EPA's "Air Services" along with the date the emissions unit(s) was permanently

removed and/or disabled. Submitting the facility profile update will constitute notifying of the permanent shutdown of the affected emissions unit(s).

- d) The provisions of this permit shall cease to be enforceable for each affected emissions unit after the date on which an emissions unit is permanently shut down (i.e., emissions unit has been physically removed from service or has been altered in such a way that it can no longer operate without a subsequent "modification" or "installation" as defined in OAC Chapter 3745-31). All records relating to any permanently shutdown emissions unit, generated while the emissions unit was in operation, must be maintained in accordance with law. All reports required by this permit must be submitted for any period an affected emissions unit operated prior to permanent shut down. At a minimum, the permit requirements must be evaluated as part of the reporting requirements identified in this permit covering the last period the emissions unit operated.

No emissions unit certified by the authorized official as being permanently shut down may resume operation without first applying for and obtaining a permit pursuant to OAC Chapter 3745-31.

- e) The permittee shall comply with any residual requirements related to this permit, such as the requirement to submit a deviation report, air fee emission report, or other any reporting required by this permit for the period the operating provisions of this permit were enforceable, or as required by regulation or law. All reports shall be submitted in a form and manner prescribed by the Director. All records relating to this permit must be maintained in accordance with law.

12. Permit-To-Operate Application

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 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).

13. Construction Compliance Certification

The applicant shall identify the following dates in the online facility profile for each new emissions unit identified in this permit.

- a) Completion of initial installation date shall be entered upon completion of construction and prior to start-up.
- b) Commence operation after installation or latest modification date shall be entered within 90 days after commencing operation of the applicable emissions unit.

14. 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.

15. Additional Reporting Requirements When There Are No Deviations of Federally Enforceable Emission Limitations, Operational Restrictions, or Control Device Operating Parameter Limitations

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., postmarked), by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters.

16. 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 any permit-to-install. The permittee shall pay all applicable permit-to-operate fees within thirty days of the issuance of the invoice.

17. Permit Transfers

Any transferee of this permit shall assume the responsibilities of the prior permit holder. The new owner must update and submit the ownership information via the "Owner/Contact Change" functionality in Air Services once the transfer is legally completed. The change must be submitted through Air Services within thirty days of the ownership transfer date.

18. Risk Management Plans

If the permittee is required to develop and register a risk management plan pursuant to section 112(r) of the Clean Air Act, as amended, 42 U.S.C. 7401 et seq. ("Act"), the permittee shall comply with the requirement to register such a plan.

19. Title IV Provisions

If the permittee is subject to the requirements of 40 CFR Part 72 concerning acid rain, the permittee shall ensure that any affected emissions unit complies with those requirements. Emissions exceeding any allowances that are lawfully held under Title IV of the Act, or any regulations adopted thereunder, are prohibited.

B. Facility-Wide Terms and Conditions



1. All the following facility-wide terms and conditions are federally enforceable with the exception of those listed below which are enforceable under state law only:
 - a) None.
2. The total allowable emissions of Hazardous Air Pollutants (HAPs), as identified in Section 112(b) of Title III of the Clean Air Act, from emissions units B001 (Dow Therm Heaters), F001 (Coal Handling 09-I), F002 (Fly Ash Handling 09-I), B007 (37.2 mmBtu/hr natural gas-fired boiler), B009 (90 mmBtu/hr traveling grate coal-fired boiler controlled with a multiclone), B010 (90 mmBtu/hr traveling grate coal-fired boiler controlled with a multiclone), P154 (wastewater pretreatment (plantwide) controlled with Carbon adsorption system), P159 (Wastewater Pretreatment 52-II), P160 (Packout 41-I), P168 (Packout 41-II), P172 (Sizing, Packing Food Colors 01-I), P173 (Sizing, Packing Food Colors 02-II), P174 (Packout 10-I), P175 (Dye Reaction 06-I), P177 (Pigment Packout 08-I), P178 (Pigment Packout 08-II), P179 (Boiler 40-I), P180 (Food Color Packaging 40-I), P181 ((Dye Filtration 36-I), P184 (Granularizing Food Colors 01-I), P187 (Pigment Flushing 39-I), P188 (Dye Drying 21-II), P189 (Pigment Salt Milling 39-I), P190 (Dye Blending 10-I), P193 (Dye Material Handling and Packout 14-I), P194 (Pigment Flushing 10-V), P200 (Dye Drying 41-I), P207 (Dye Drying 41-II), P208 (Dye Drying 41-III), P209 (Seal Water Cooling 41-I), P215 (Dye Drying 21-I), P222 (Dye Grinding and Blending 41-I), P223 (Dye Reaction 36-I), P224 (Dye Reaction 36-II), P225 (Dye Reaction 36-III), P226 (Dye Reaction 36-IV), P227 (Condensate Recovery 36-I), P228 (Mother Liquor Handling 36-I), P229 (Wash Preparation 36-I), P230 (Dye Reaction 36-VI), P231 (Dye Reaction 36-VII), P232 (Dye Reaction 36-X), P233 (Dye Salting 36-I), P234 (Dye Slurry Holding 36-I), P237 (Dye Mixing and Milling 36-II), P238 (Dye Blending 36-I), P240 (Dye Reaction 36-IX), P241 (Dye Reaction 36-V), P242 (Condensate Recovery 36-II), P243 (Dye Reaction 36-VIII), P245 (Dye Reaction 20-I), P246 (Tray Drying 10-I), P249 (Tray Drying 10-II), P250 (Dye Reaction 10-I), P251 (Dye Clarification 20-I), P261 (Tray Drying 10-III), P263 (Tray Drying 10-IV), P266 (Tray Drying 10-V), P282 (Packout 21-I), P284 (Dye Drying 14-I), P295 (Dye Mfg. 12-I), P296 (Dye Reaction 12-I), P297 (Tray Drying 08-I), P313 (Dye Reaction 12-II), P314 (Dye Reaction 12-III), P315 (Separation/Filtration 12-I), P316 (Dry Reaction 12-IV), P317 (Dye Sulfonation 12-XIV), P318 (Dye Sulfonation 12-XV), P319 (Dye Sulfonation 12-I), P320 (Dye Sulfonation 12-II), P321 (Dye Sulfonation 12-III), P322 (Dye Sulfonation 12-IV), P323 (Dye Sulfonation 12-V), P324 (Dye Sulfonation 12-VI), P325 (Dye Sulfonation 12-VII), P326 (Dye Sulfonation 12-VIII), P327 (Dye Sulfonation 12-IX), P328 (Dye Sulfonation 12-X), P329 (Dye Sulfonation 12-XI), P330 (Dye Sulfonation 12-XII), P331 (Dye Sulfonation 12-XIII), P332 (Separation/Filtration 12-II), P333 (Separation/Filtration 12-IV), P334 (Separation/Filtration 12-V), P335 (Pigment Mfg. 12-II), P336 (Separation/Filtration 12-VII), P337 (Separation/Filtration 12-VIII), P338 (Pigment Mfg. 12-I), P339 (Dye Mfg. 12-II), P340 (Dye Mfg. 12-V), P341 (Dye Mfg. 12-VI), P342 (Dye Reaction 12-III), P343 (Dye Mfg. 12-III), P344 (Dye Mfg. 12-IV), P345 (Dye Mfg. 12-V), P346 (Dye Mfg. 12-VI), P347 (Dye Mfg. 12-VII), P348 (Dye Mfg. 12-VIII), P349 (Dye Mfg. 12-IX), P350 (Pigment Milling 12-I), P351 (Dye Reaction 12-VIII), P352 (Dye Mfg. XI), P353 (Separation/Filtration 12-X), P354 (Separation/Filtration 12-XI), P355 (Separation/Filtration 12 XII), P356 (Pigment Milling 12-II), P357 (Separation/Filtration 12-XIV), P358 (Dye Mfg. 12-XIII), P359 (Separation/Filtration 12-12-XV), P360 (Dye Mfg. 12-XIII), P361 (Dye Mfg. 12 XIV), P362 (Dye Mfg. 12-XV), P363 (Tray Drying 08-II), P364 (Tray Drying 08-III), P365 (Tray Drying 08-V), P366 (Vacuum Drying 08-I), P367 (Pigment Mfg. 08-I), P368 (Pigment Mfg. 08-II), P369 (Pigment Mfg. 08-III), P370 (Pigment Mfg. 08-IV), P371 (Diazo Pigment Reaction 08-II), P372 (Diazo Pigment Reaction 08-I), P373 (Grinding Blending), Packing Dyes 08-I), P374 (Grinding Blending), Packing Dyes 08-II), P379 (Varnish and Misc. Reaction 12-I), P380 (Varnish Mfg. 12-I), P381 (Varnish and Misc. Reaction 13-II), P382 (Varnish and Misc. Reaction 13-III), P383 (Packout 01-I), P384 (Packout 02-I), P385 (Tray Drying 02-I), P386 (Tray Drying 02-II), P387 (Food Color Mfg. 02-I), P388 (Tray Drying 01-I), P389



(Vacuum Drying 01-I), P390 (Spray Drying 02-I), P391 (Drum Drying Food Colors 020I), P392 (Liquid Color Solutions 02-I), P393 (Pilot Plant Reaction 35-I), P394 (Pilot Plant Reaction 35-II), P395 (Pilot Plant Vacuum Tray Drying 35-I), P396 (Pilot Plant Reaction 35-VI), P397 (Pilot Plant Vacuum Drying 35-I), P398 (Pilot Plant Tray Drying 35-I), P399 (Sizing, Packing Food Colors 02-III), P400 (Sizing, Packing Food Colors 02-II), P401 (Varnish and Misc. Reaction 13-IV), P402 (Pilot Plant Reaction 35-VIII), P403 (Pilot Plant Reaction 35-IX), P404 (Pilot Plant Reaction 35-X), P405 (Grinding, Blending, Packing Dyes 08-I), P406 (Grinding, Blending, Packing Dyes 08-II), P407 (Grinding, Packing Pigments 08-I), P408 (Pigment Filtration 08-I), P409 (Pigment Flushing 10-I), P410 (Pigment Flushing 10-II), P411 (Pigment Flushing 10-III), P412 (Pigment Flushing 10-IV), P413 (Pigment Flushing 10-VI), P414 (Pigment Flushing 10-VII), P415 (Pigment Flushing 10-VIII), P416 (Pigment Flushing 10-IX), P417 (Pigment Flushing 10-X), P418 (Pigment Flushing 10-XI), P419 (Pigment Flushing 10-XII), P420 (Pigment Flushing 10-XIII), P421 (Pigment Flushing 10-V), P422 (Spray Drying Food Colors), P423 (Pigment Dispersing 10-I), P424 (Pigment Milling 12-III), P425 (Separation/Filtration 12-XVII), P426 (Separation/Filtration 12-IX), P427 (Dye Mfg.12-XVII), P428 (Dye Mfg. 12-XVIII), P429 (Dye Mfg. 12-XIX), P430 (Pigment Mfg. 08-VI), P431 (Pigment Mfg. 08-VII), P432 (Pigment Mfg. 08-VIII), P433 (Pigment Mfg. 08-IX), P434 (Pigment Mfg. 08-X), P435 (Pigment Mfg. 08-XI), P436 (Pigment Mfg. 08-XII), P437 (Pigment Mfg. 08-XIII), P438 (Pigment Mfg. 08-XIV), P439 (Pigment Mfg. 08-XV), P441 (Pigment Mfg. 12-III), P442 (Pigment Mfg. 12-IV), P443 (Pigment Mfg. 12-V), P444 (Pigment Mfg. 12-VI), P445 (Pigment Mfg. 12-VII), P446 (Pigment Mfg. 12-VIII), P447 (Pigment Mfg. 12-IX), P448 (Pigment Mfg. 12-X), P449 (Pigment Mfg. 12-XI), P450 (Pigment Mfg. 12-XII), P451 (Pigment Mfg. 12-XIII), P452 (Pigment Mixing 12-III), P453 (Pigment Mixing 12-1), P454 (Pigment Mixing 12-II), P455 (Pigment Dispersion 12-I), P456 (Pigment Dispersion 12- II), P457 (Liquid Color Solutions 02-II), P459 (Tank TF-XXV), P460 (Tank 14-VIII), P461 (Pigment Dispersion 12-IV), P462 (Milled Pigments), P466 (Grinding/ Blending 21-I), P467 (Pigment Mfg. 12-XV), P468 ((Pigment Mfg. 12-XVI), P469 (Solvent Storage 12-I), P470 (FD&C Lakes Blending), P473 (Pigment Mfg. 12-XVII), P474 (Pigment Mfg. 12-XVIII), P475 (Pigment Mfg. 12-XIX), P476 (Ball Mill A), P477 (Ball Mill B), P478 (Ball Mill C), P479 (Ball Mill D), P480 (Ball Mill E), P481 (Ball Mill F), P482 (Ball Mill G), P483 (Ball Mill L), P484 (High Speed Disperser 1), P485 (High Speed Disperser 2), P486 (High Speed Disperser 3), P487 (High Speed Disperser 4), P488 (High Speed Disperser 5), P489 (High Speed Disperser 6), P490 (High Speed Disperser 7), P491 (High Speed Disperser 8), P492 (High Speed Disperser 9), P493 (High Speed Disperser 10), P494 (High Speed Disperser 11), P495 (Drais Mill 1 DR), P496 (Drais Mill 2 DR), P497 (Drais Mill 3 DR), P498 (Drais Mill 4 DR), P499 (Pony Mixer 1), P500 (Double Post Mixer), P501 (Pony Mixer 3), P502 (Roll Mill 1), P503 (Roll Mill 2), P504 (Roll Mill 3), P505 (Roll Mill 4), P506 (Roll Mill 5), P507 (Roll Mill 6), P512 (Oil-based carbon dispersion process), P513 (Water-based carbon dispersion train), P514 (Mulch colorant dispersion media), T002 (Tank 14-III), T006 (Tank 54-I), T013 (Tank 12-IV), T014 (Tank 12-III), T015 (Tank 03-I), T020 (Tank 41-VI), T023 (Tank 13-I), T024 (Tank 13-II), T025 (Tank 13-III), T026 (Tank 13-IV), T027 (Tank 13-V), T028 (Tank 13-IX), T029 (Tank 13-VII), T030 (Tank 13-VIII), T035 (Tank 20-XIII), T037 (Tank 20-XV), T038 (Tank 20-X), T039 (Tank 20-XII), T042 (Tank 54-II), T047 (Tank 21-IV), T055Tank TF-XX), T056Tank TF-XXI), T061Tank TF-VIII), T066Tank TF-XIII), T067 (Tank 21-II), T069 (Tank 36-VII), T070 (Tank 36-V), T073 (Tank 36-VI), T077 (Tank 24-1), T078 (Tank 09-I), T079 (Tank TF-II), T080 (Tank TF-V), T081 (Tank TF-VI), T082 (Tank TF-VII), T085 (Tank 21-VI), T087 (Tank TF-I), T088 (Tank TF-IX), T089 (Tank TF-X), T090 (Tank TF-XII), T091 (Tank 21-III), T092 (Tank 14-V), T093 (Tank 21-I), T094 (Tank 14-I), T095 (Tank 54-III), T096 (Tank 14-IV), T097 (Tank 20-V), T098 (Tank 41-II), T099 (Tank 41-III), T100 (Tank 41-IV), T101 (Tank 41-V), T102 (Tank 41-VII), T103 (Tank 41-VIII), T104 (Tank 41-IX), T105 (Tank TF-XXIV), T106 (Tank TF-XXVI), T107 (Tank TF-XXVII), T108 (Tank 20-XVII), T109 (Tank 54-IV), T110 (Tank 14-VI), T111 (Tank 14-VII), T112 (Tank 20-I), T113 (Tank TF-XVIII), T114 (Tank 20-II), T115 (Tank TF-XXII), T116 (Tank 36-I), T117 (Tank 21-V), T118 (Tank 41-V), T119(Tank 36-IV), including any de



minimum air contaminant sources, as defined in OAC rule 3745-15-05, and permanent exemption air contaminant sources shall not exceed 9.9 TPY for any single HAP and 24.9 TPY for any combination of HAPs. Compliance with the above limitations shall be based on a rolling, 12-month summation.

The permittee has existing records to demonstrate compliance with the rolling, 12-month emissions limitation upon issuance of the permit.

3. The permittee shall collect and record the following information each month:
 - a) The monthly single HAP emissions from all facility emissions units contained in 2. combined, in pounds, for each single HAP.
 - a) The rolling, 12-month summation of single HAP emissions, in tons, from all facility emission units contained in 2. combined calculated as below for each single HAP:

The rolling, 12-month summation of single HAP emissions = (monthly single HAP emissions from (a) + sum of monthly single HAP emissions from previous 11 calendar months) ÷ 2000.
 - b) The monthly total HAPs (sum of all single HAPs) emissions from all facility emissions units contained in 2. combined, in pounds.
 - c) The rolling, 12-month summation of total HAP (sum of all single HAP) emissions, in tons, from all facility emissions units contained in 2. combined calculated as below:

The rolling, 12-month summation of total HAP (sum of all single HAP emissions = (monthly total HAP emissions from (c) + sum of monthly total HAP emissions from previous 11 calendar months) ÷ 2000.
4. The permittee shall notify the Hamilton County Department of Environmental Services of any exceedance of the HAP emission limitations outlined in 2. If no exceedances occurred, the permittee shall state so in the report. The reports shall be submitted by January 31, April 30, July 31 and October 31 of each year and shall cover the previous calendar quarters (October through December, January through March, April through June and July through September, respectively).
5. Emission Limitations:

9.9 TPY for any single HAP and 24.9 TPY for combined HAPs, based on a rolling 12-month summation for the emissions units listed in 2.

Applicable Compliance Method:
6. Compliance with the HAP emission limitations shall be demonstrated by the record keeping requirements specified in 3.

C. Emissions Unit Terms and Conditions



1. P512, Oil-based carbon dispersion process

Operations, Property and/or Equipment Description:

Oil-based carbon dispersion process

a) The following emissions unit terms and conditions are federally enforceable with the exception of those listed below which are enforceable under state law only.

(1) g)(1).

b) Applicable Emissions Limitations and/or Control Requirements

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

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3), as effective 11/30/01	<p>Emissions of Volatile Organic Compounds (VOC) shall not exceed 26.7 lbs/hour.</p> <p>Particulate emissions and emissions of particulate matter 10 microns and less in diameter (PE/PM10)* shall not exceed 0.20 pound per hour and 0.86 ton per year.</p> <p>*Assume all emissions of particulate matter 2.5 microns and less in diameter PM2.5 are a subset of PM10 emissions.</p> <p>See b)(2)a., b)(2)b., and b)(2)f.</p> <p>The requirements for this rule also include compliance with the requirements of OAC rule 3745-31-05(D), OAC rule 3745-17-07(A)(1), OAC rule 3745-17-07(B)(1), OAC rule 3745-17-08(B)(3), and OAC rule 3745-17-11(B).</p>
b.	OAC rule 3745-31-05(D) (Synthetic minor to avoid Major NSR permitting)	<p>Emissions of Volatile Organic Compounds (VOC) shall not exceed 31.75 tons per year based on a rolling, 12-month summation.</p> <p>See b)(2)c.</p>

c.	OAC rule 3745-31-05(A)(3)(b), as effective 12/01/06	See b)(2)g.
d.	OAC rule 3745-17-07(A)(1)	The visible particulate emissions from any stack shall not exceed 20 percent opacity, as a six-minute average, except as specified by rule.
e.	OAC rule 3745-17-07(B)(1)	The visible particulate emissions from any fugitive dust source shall not exceed 20 percent opacity, as a three-minute average.
f.	OAC rule 3745-17-08(B)(3)	See b)(2)d. and b)(2)e.
g.	OAC rule 3745-17-11(B)	a) Particulate emissions shall not exceed 4.73 lbs/hour.

(2) Additional Terms and Conditions

- a. The permittee shall employ a dust collector during dry materials addition activities.
- b. The short-term hourly VOC and PE/PM10 emissions are based on the emissions unit's Potential to Emit (PTE). Therefore, no hourly records are required to demonstrate compliance with these limitations.
- c. The total VOC input for emissions unit P512 (Oil-Based Carbon Dispersion Train) shall not exceed 2117 tons per year based upon a rolling, 12-month summation of the VOC input.
- d. The particulate emission rate at the control device outlet shall not exceed 0.030 grain of particulate emissions per dry standard cubic foot of exhaust gas or no visible particulate emissions from the exhaust stack, whichever is less stringent.
- e. The fugitive dust from this emissions unit shall be controlled by the use of reasonably available control measures adequate to minimize or eliminate visible particulate emissions.
- f. The permittee has satisfied the Best Available Technology (BAT) requirements pursuant to Ohio Administrative Code (OAC) paragraph 3745-31-05(A)(3), as effective November 30, 2001, in this permit. On December 1, 2006, paragraph (A)(3) of OAC rule 3745-31-05 was revised to conform to the Ohio Revised Code (ORC) changes effective August 3, 2006 (Senate Bill 265 changes), such that BAT is no longer required by State regulations for National Ambient Air Quality Standards (NAAQS) pollutant(s) less than ten tons per year. However, that rule revision has not yet been approved by U.S. EPA as a revision to Ohio's State Implementation Plan (SIP). Therefore, until the SIP revision occurs and the U.S. EPA approves the revisions to OAC rule 3745-31-05, the requirement to satisfy BAT still exists as part of the federally-approved SIP for Ohio. Once U.S. EPA

approves the December 1, 2006 version of OAC rule 3745-31-05, then these emission limitations/control measures no longer apply.

- g. This rule paragraph applies once U.S. EPA approves the December 1, 2006 version of OAC rule 3745-31-05 as part of the State Implementation Plan.

The Best Available Technology (BAT) requirements under OAC rule 3745-31-05(A)(3) do not apply to the PE/PM10* emissions from this air contaminant source since the uncontrolled potential to emit for PE/PM10 is less than 10 tons/yr each.

c) Operational Restrictions

- (1) None.

d) Monitoring and/or Recordkeeping Requirements

- (1) The permittee shall collect and record the following information each month:

- a. The identification number of each batch made (product code).
- b. The batch size in pounds.
- c. The total pigment content of each batch; in pounds.
- d. The liquid volatile organic compound input for each batch, in pounds.
- e. The liquid organic cleanup material employed, in pounds.
- f. The total monthly emissions, in pounds as calculated below:

Monthly VOC emissions = Sum of [(d) x 0.015 lb of VOC emission/lb of VOC input] for all batches made per month.

- g. The rolling, 12-month summation of VOC emissions, in tons, from this emissions unit as calculated below:

Rolling, 12-month summation of VOC emissions = (monthly VOC emissions from (f) + sum of monthly VOC emissions from previous 11 calendar months)/2000).

- (2) The permittee shall maintain monthly records of the following:

- a. The total monthly VOC input for emissions unit P512, in tons.
- b. The rolling, 12-month summation of the VOC input, in tons, from emissions unit P512, as calculated as below:

Rolling, 12-month summation of the VOC input, = (monthly VOC input from (a) + sum of monthly VOC input from previous 11 calendar months).

Also, during the first 12 calendar months of operation following issuance of this permit, the permittee shall record the cumulative VOC input for each calendar month.

- (3) The permittee shall properly install, operate, and maintain equipment to continuously monitor the pressure drop, in inches of water, across the baghouse when the controlled emissions unit(s) is/are in operation, including periods of startup and shutdown. The permittee shall record the pressure drop across the baghouse on daily basis. The monitoring equipment shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and operating manual(s). The acceptable pressure drop shall be based upon the manufacturer's specifications until such time as any required emission testing is conducted and the appropriate range is established to demonstrate compliance.

Whenever the monitored value for the pressure drop deviates from the limit or range established in accordance with this permit, the permittee shall promptly investigate the cause of the deviation. The permittee shall maintain records of the following information for each investigation:

- a. the date and time the deviation began;
- b. the magnitude of the deviation at that time;
- c. the date the investigation was conducted;
- d. the name(s) of the personnel who conducted the investigation; and
- e. the findings and recommendations.

In response to each required investigation to determine the cause of a deviation, the permittee shall take prompt corrective action to bring the operation of the control equipment within the acceptable range specified in this permit, unless the permittee determines that corrective action is not necessary and documents the reasons for that determination and the date and time the deviation ended. The permittee shall maintain records of the following information for each corrective action taken:

- a. a description of the corrective action;
- b. the date corrective action was completed;
- c. the date and time the deviation ended;
- d. the total period of time (in minutes) during which there was a deviation;
- e. the pressure drop readings immediately after the corrective action was implemented; and
- f. the name(s) of the personnel who performed the work.

Investigation and records required by this paragraph do not eliminate the need to comply with the requirements of OAC rule 3745-15-06 if it is determined that a malfunction has occurred.

This range or limit on the pressure drop across the baghouse is effective for the duration of this permit, unless revisions are requested by the permittee and approved in writing by the appropriate Ohio EPA District Office or local air agency. The permittee may request revisions to the permitted limit or range for the pressure drop based upon information obtained during future testing that demonstrate compliance with the allowable particulate emission rate for the controlled emissions unit(s). In addition, approved revisions to the range or limit will not constitute a relaxation of the monitoring requirements of this permit and may be incorporated into this permit by means of a minor permit modification.

e) Reporting Requirements

(1) The permittee shall submit quarterly deviation (excursion) reports that identify the following information concerning the operation of the baghouse during the operation of the emissions unit(s):

- a. each period of time (start time and date, and end time and date) when the pressure drop across the baghouse was outside of the range specified by the manufacturer and outside of the acceptable range following any required compliance demonstration;
- b. an identification of each incident of deviation described in [a] (above) where a prompt investigation was not conducted;
- c. an identification of each incident of deviation described in [a] where prompt corrective action, that would bring the pressure drop into compliance with the acceptable range, was determined to be necessary and was not taken; and
- d. an identification of each incident of deviation described in [a] where proper records were not maintained for the investigation and/or the corrective action(s), as identified in the monitoring and record keeping requirements of this permit.

If no deviations/excursions occurred during a calendar quarter, the report shall so state that no deviations occurred during the reporting period.

(2) The permittee shall submit quarterly deviation (excursion) reports which identify all exceedances of both the rolling, 12 month VOC input and emission limitations and, for the first 12 calendar months of operation or the first 12 calendar months following the issuance of this permit, all exceedances of the maximum allowable cumulative emission levels. These reports shall be submitted in accordance with the reporting requirements specified in Section A of the Standard Terms and Conditions of this permit.

(3) The permittee shall submit annual reports which specify the total VOC emissions from this emissions unit for the previous calendar year. These reports shall be submitted by January 31 of each year.

f) Testing Requirements

(1) The permittee may determine the VOC content of materials based on formulation data, and may rely on volatile matter content data provided by material suppliers. In the event of any inconsistency between the formulation data and the results of Test Methods 24 or

24A of 40 CFR Part 60, Subpart A, Test Methods 24 or 24A shall be used unless the permittee can demonstrate to the satisfaction of the agency that the formulation data is correct.

(2) Emission limitation:

Emissions of Volatile Organic Compounds (VOC) shall not exceed 26.7 lbs/hour.

Applicable Compliance Method:

Compliance with the VOC emission limitations in term b)(1) shall be determined by emission factors from AP-42, 6.4-1 (5/83), Uncontrolled emission factors for paint and varnish manufacturing.

(3) Emission limitation:

Emissions of Volatile Organic Compounds (VOC) shall not exceed 31.75 tons per year based on a rolling, 12-month summation

Applicable Compliance Method:

Compliance shall be determined based on recordkeeping in d)(2).

(4) Emission Limitation:

Particulate emissions and emissions of particulate matter 10 microns and less in diameter (PE/PM10) shall not exceed 0.20 pound per hour and 0.86 ton per year.

Particulate emissions shall not exceed 4.73 pounds per hour.

PE/PM10 shall not exceed 10 tons per year.

Applicable Compliance Method:

Compliance with the particulate emission limitations in b)(1) shall be determined by emission factors from AP-42 6.7-1 (5/83), Emission Factors for Printing Ink Manufacturing, and a dust collector capture efficiency of 90 percent and control efficiency of 99 percent.

If required, the permittee shall demonstrate compliance with the lb/hour emission limitation through emission tests performed in accordance with 40 CFR Part 60, Appendix A, Methods 1- 5.

Compliance with the 0.86 ton per year of PE limitation shall be determined based on recordkeeping in d)(1) by summing all the monthly records.

Compliance with the PM10 limitation is assumed with compliance with the PE limitations.

(5) Emission Limitation:

The particulate emission rate at the control device outlet shall not exceed 0.030 grain of particulate emissions per dry standard cubic foot of exhaust gas or no visible particulate emissions from the exhaust stack, whichever is less stringent.

Applicable Compliance Method:

If required, the permittee shall demonstrate compliance by emission testing in accordance with the procedures specified in 40 CFR Part 60, Appendix A, Methods 1 through 5 and the procedures specified in OAC rule 3745-17-03(B)(10).

Compliance may be determined through visible emission observations performed in accordance with U.S. EPA Method 9.

(6) Emission Limitation:

Visible particulate emissions shall not exceed 20 percent opacity, as a six-minute average, except as provided by the rule.

Applicable Compliance Method:

Compliance shall be determined through visible emission observations performed in accordance with U.S. EPA Method 9.

(7) Emission Limitation:

Fugitive visible particulate emissions shall not exceed 20 percent opacity, as a three-minute average, except as provided by the rule.

Applicable Compliance Method:

Compliance shall be determined through visible emission observations performed in accordance U.S. EPA Method 9 and the procedures specified in OAC rule 3745-17-03(B)(3).

g) Miscellaneous Requirements

- (1) 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.



2. P513, Water-based carbon dispersion train

Operations, Property and/or Equipment Description:

Water-based carbon dispersion train

a) The following emissions unit terms and conditions are federally enforceable with the exception of those listed below which are enforceable under state law only.

(1) d)(4) thru d)(7).

b) Applicable Emissions Limitations and/or Control Requirements

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

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3), as effective 11/30/01	<p>Emissions of Volatile Organic Compounds (VOC) shall not exceed 4.71 lbs/hour.</p> <p>Particulate emissions and emissions of particulate matter 10 microns and less in diameter (PE/PM10)* shall not exceed 0.10 pound per hour and 0.46 ton per year.</p> <p>*Assume all emissions of particulate matter 2.5 microns and less in diameter PM2.5 are a subset of PM10 emissions.</p> <p>See b)(2)a., b)(2)b., and b)(2)f.</p> <p>The requirements for this rule also include compliance with the requirements of OAC rule 3745-31-05(D), OAC rule 3745-17-07 (A)(1), OAC rule 3745-17-07 (B)(1), OAC rule 3745-17-08 (B)(3), and OAC rule 3745-17-11(B).</p>
b.	OAC rule 3745-31-05(D) (Synthetic minor to avoid Major NSR permitting)	<p>Emissions of Volatile Organic Compounds (VOC) shall not exceed 8.13 tons per year based on a rolling, 12-month summation.</p> <p>See b)(2)c.</p>

c.	OAC rule 3745-31-05(A)(3)(b), as effective 12/01/06	See b)(2)g.
d.	OAC rule 3745-17-07 (A)(1)	The visible particulate emissions from any stack shall not exceed 20 percent opacity, as a six-minute average, except as specified by rule.
e.	OAC rule 3745-17-07 (B)(1)	The visible particulate emissions from any fugitive dust source shall not exceed 20 percent opacity, as a three-minute average.
f.	OAC rule 3745-17-08 (B)(3)	See b)(2)d. and b)(2)e.
g.	OAC rule 3745-17-11 (B)	Particulate emissions shall not exceed 2.84 lbs/hour.

(2) Additional Terms and Conditions

- a. The permittee shall employ a dust collector during dry materials addition activities.
- b. The short-term hourly VOC and PE/PM10 emissions are based on the emissions unit's Potential to Emit (PTE). Therefore, no hourly records are required to demonstrate compliance with these limitations.
- c. The total VOC input for emissions unit P513 (Water-Based Carbon Dispersion Train) shall not exceed 542 tons per year based upon a rolling, 12-month summation of the VOC input.
- d. The particulate emission rate at the control device outlet shall not exceed 0.030 grain of particulate emissions per dry standard cubic foot of exhaust gas or no visible particulate emissions from the exhaust stack, whichever is less stringent.
- e. The fugitive dust from this emissions unit shall be controlled by the use of reasonably available control measures adequate to minimize or eliminate visible particulate emissions.
- f. The permittee has satisfied the Best Available Technology (BAT) requirements pursuant to Ohio Administrative Code (OAC) paragraph 3745-31-05(A)(3), as effective November 30, 2001, in this permit. On December 1, 2006, paragraph (A)(3) of OAC rule 3745-31-05 was revised to conform to the Ohio Revised Code (ORC) changes effective August 3, 2006 (Senate Bill 265 changes), such that BAT is no longer required by State regulations for National Ambient Air Quality Standards (NAAQS) pollutant(s) less than ten tons per year. However, that rule revision has not yet been approved by U.S. EPA as a revision to Ohio's State Implementation Plan (SIP). Therefore, until the SIP revision occurs and the U.S. EPA approves the revisions to OAC rule 3745-31-05, the requirement to satisfy BAT still exists as part of the federally-approved SIP for Ohio. Once U.S. EPA approves the December 1, 2006 version of OAC rule 3745-31-05, then these emission limitations/control measures no longer apply.

- g. This rule paragraph applies once U.S. EPA approves the December 1, 2006 version of OAC rule 3745-31-05 as part of the State Implementation Plan.

The Best Available Technology (BAT) requirements under OAC rule 3745-31-05(A)(3) do not apply to the PE/PM10 emissions from this air contaminant source since the uncontrolled potential to emit for PE/PM10* is less than 10 tons/yr each.

c) Operational Restrictions

- (1) None.

d) Monitoring and/or Recordkeeping Requirements

- (1) The permittee shall collect and record the following information each month:

- a. The identification number of each batch made (product code).
- b. The batch size in pounds.
- c. The total pigment content of each batch; in pounds.
- d. The liquid volatile organic compound input for each batch, in pounds.
- e. The liquid organic cleanup material employed, in pounds.
- f. The total monthly emissions, in pounds as calculated below:

Monthly VOC emissions = Sum of [(d) x 0.015 lb of VOC emission/lb of VOC input] for all batches made per month.

- g. The rolling, 12-month summation of VOC emissions, in tons, from this emissions unit as calculated below:

Rolling, 12-month summation of VOC emissions = (monthly VOC emissions from (f) + sum of monthly VOC emissions from previous 11 calendar months)/2000).

- (2) The permittee shall maintain monthly records of the following:

- a. The total monthly VOC input for emissions unit P513, in tons.
- b. The rolling, 12-month summation of the VOC input, in tons, from emissions unit P513, as calculated as below:

Rolling, 12-month summation of the VOC input, = (monthly VOC input from (a) + sum of monthly VOC input from previous 11 calendar months).

Also, during the first 12 calendar months of operation following issuance of this permit, the permittee shall record the cumulative VOC input for each calendar month.

- (3) The permittee shall properly install, operate, and maintain equipment to continuously monitor the pressure drop, in inches of water, across the baghouse when the controlled emissions unit(s) is/are in operation, including periods of startup and shutdown. The permittee shall record the pressure drop across the baghouse on daily basis. The monitoring equipment shall be installed, calibrated, operated, and maintained in accordance with the manufacturers recommendations, instructions, and operating manual(s). The acceptable pressure drop shall be based upon the manufacturer's specifications until such time as any required emission testing is conducted and the appropriate range is established to demonstrate compliance.

Whenever the monitored value for the pressure drop deviates from the limit or range established in accordance with this permit, the permittee shall promptly investigate the cause of the deviation. The permittee shall maintain records of the following information for each investigation:

- a. the date and time the deviation began;
- b. the magnitude of the deviation at that time;
- c. the date the investigation was conducted;
- d. the name(s) of the personnel who conducted the investigation; and
- e. the findings and recommendations.

In response to each required investigation to determine the cause of a deviation, the permittee shall take prompt corrective action to bring the operation of the control equipment within the acceptable range specified in this permit, unless the permittee determines that corrective action is not necessary and documents the reasons for that determination and the date and time the deviation ended. The permittee shall maintain records of the following information for each corrective action taken:

- a. a description of the corrective action;
- b. the date corrective action was completed;
- c. the date and time the deviation ended;
- d. the total period of time (in minutes) during which there was a deviation;
- e. the pressure drop readings immediately after the corrective action was implemented; and
- f. the name(s) of the personnel who performed the work.

Investigation and records required by this paragraph do not eliminate the need to comply with the requirements of OAC rule 3745-15-06 if it is determined that a malfunction has occurred.

This range or limit on the pressure drop across the baghouse is effective for the duration of this permit, unless revisions are requested by the permittee and approved in writing by

the appropriate Ohio EPA District Office or local air agency. The permittee may request revisions to the permitted limit or range for the pressure drop based upon information obtained during future testing that demonstrate compliance with the allowable particulate emission rate for the controlled emissions unit(s). In addition, approved revisions to the range or limit will not constitute a relaxation of the monitoring requirements of this permit and may be incorporated into this permit by means of a minor permit modification

- (4) The permit to install for this emissions unit (P513) was evaluated based on the actual materials and the design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit application. The Toxic Air Contaminant Statute, ORC 3704.03(F), was applied to this/these emissions unit(s) for each toxic air contaminant listed in OAC rule 3745-114-01, using data from the permit application; and modeling was performed for each toxic air contaminant(s) emitted at over one ton per year using an air dispersion model such as SCREEN 3.0, AERMOD, or ISCST3, or other Ohio EPA approved model. The predicted 1-hour maximum ground-level concentration result(s) from the approved air dispersion model, was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC), calculated as described in the Ohio EPA guidance document entitled Review of New Sources of Air Toxic Emissions, Option A, as follows:
- a. the exposure limit, expressed as a time-weighted average concentration for a conventional 8-hour workday and a 40-hour workweek, for each toxic compound(s) emitted from the emissions unit(s), (as determined from the raw materials processed and/or coatings or other materials applied) has been documented from one of the following sources and in the following order of preference (TLV was and shall be used, if the chemical is listed):
 - i. threshold limit value (TLV) from the American Conference of Governmental Industrial Hygienists (ACGIH) Threshold Limit Values for Chemical Substances and Physical Agents Biological Exposure Indices; or
 - ii. STEL (short term exposure limit) or the ceiling value from the American Conference of Governmental Industrial Hygienists (ACGIH) Threshold Limit Values for Chemical Substances and Physical Agents Biological Exposure Indices; the STEL or ceiling value is multiplied by 0.737 to convert the 15-minute exposure limit to an equivalent 8-hour TLV/None.
 - b. The TLV is divided by ten to adjust the standard from the working population to the general public (TLV/10).
 - c. This standard was then adjusted to account for the duration of the exposure or the operating hours of the emissions unit, i.e., 24 hours per day and 7 days per week, from that of 8 hours per day and 5 days per week. The resulting calculation was (and shall be) used to determine the Maximum Acceptable Ground-Level Concentration (MAGLC):

$$TLV/10 \times 8/X \times 5/Y = 4 TLV/XY = MAGLC$$

- d. The following summarizes the results of dispersion modeling for the significant toxic contaminants (emitted at 1 or more tons/year) or worst case toxic contaminant(s):

Toxic Contaminant: ethylene glycol

TLV (mg/m³): 100,000

Maximum Hourly Emission Rate (lbs/hr): 4.71

Predicted 1-Hour Maximum Ground-Level Concentration (ug/m³): 367.3

MAGLC (ug/m³): 2381

The permittee, has demonstrated that emissions of ethylene glycol, from emissions unit(s) P513, is calculated to be less than eighty per cent of the maximum acceptable ground level concentration (MAGLC); any new raw material or processing agent shall not be applied without evaluating each component toxic air contaminant in accordance with the Toxic Air Contaminant Statute, ORC 3704.03(F).

- (5) Prior to making any physical changes to or changes in the method of operation of the emissions unit(s), that could impact the parameters or values that were used in the predicted 1-hour maximum ground-level concentration, the permittee shall re-model the change(s) to demonstrate that the MAGLC has not been exceeded. Changes that can affect the parameters/values used in determining the 1-hour maximum ground-level concentration include, but are not limited to, the following:
- changes in the composition of the materials used or the use of new materials, that would result in the emission of a new toxic air contaminant with a lower Threshold Limit Value (TLV) than the lowest TLV previously modeled;
 - changes in the composition of the materials, or use of new materials, that would result in an increase in emissions of any toxic air contaminant listed in OAC rule 3745-114-01, that was modeled from the initial (or last) application; and
 - physical changes to the emissions unit(s) or its/their exhaust parameters (e.g., increased/ decreased exhaust flow, changes in stack height, changes in stack diameter, etc.).

If the permittee determines that the Toxic Air Contaminant Statute will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to a non-restrictive change to a parameter or process operation, where compliance with the Toxic Air Contaminant Statute, ORC 3704.03(F), has been documented. If the change(s) meet(s) the definition of a [modification] or if a new toxic is emitted, or the modeled toxic(s) is/are expected to exceed the previous modeled level(s), then the permittee shall apply for and obtain a final permit-to-install prior to the change. The Director may consider any significant departure from the operations of the emissions unit, described in the permit-to-install application, as a modification that results in greater emissions than the emissions rate

modeled to determine the ground level concentration; and may require the permittee to submit a permit-to-install application for the increased emissions.

- (6) The permittee shall collect, record, and retain the following information for each toxic evaluation conducted to determine compliance with the Toxic Air Contaminant Statute, ORC 3704.03(F):
- a. description of the parameters/values used in each compliance demonstration and the parameters or values changed for any re-evaluation of the toxic(s) modeled (the composition of materials, new toxic contaminants emitted, change in stack/exhaust parameters, etc.);
 - b. the Maximum Acceptable Ground-Level Concentration (MAGLC) for each significant toxic contaminant or worst-case contaminant, calculated in accordance with the Toxic Air Contaminant Statute, ORC 3704.03(F);
 - c. a copy of the computer model run(s), that established the predicted 1-hour maximum ground-level concentration that demonstrated the emissions unit(s) to be in compliance with the Toxic Air Contaminant Statute, ORC 3704.03(F), initially and for each change that requires re-evaluation of the toxic air contaminant emissions; and
 - d. the documentation of the initial evaluation of compliance with the Toxic Air Contaminant Statute, ORC 3704.03(F), and documentation of any determination that was conducted to re-evaluate compliance due to a change made to the emissions unit(s) or the materials applied.
- (7) The permittee shall maintain a record of any change made to a parameter or value used in the dispersion model, used to demonstrate compliance with the Toxic Air Contaminant Statute, ORC 3704.03(F), through the predicted 1-hour maximum ground-level concentration. The record shall include the date and reason(s) for the change and if the change would increase the ground-level concentration.

e) **Reporting Requirements**

- (1) The permittee shall submit quarterly deviation (excursion) reports that identify the following information concerning the operation of the baghouse during the operation of the emissions unit(s):
- a. each period of time (start time and date, and end time and date) when the pressure drop across the baghouse was outside of the range specified by the manufacturer and outside of the acceptable range following any required compliance demonstration;
 - b. an identification of each incident of deviation described in [a] (above) where a prompt investigation was not conducted;

- c. an identification of each incident of deviation described in a where prompt corrective action, that would bring the pressure drop into compliance with the acceptable range, was determined to be necessary and was not taken; and
- d. an identification of each incident of deviation described in a where proper records were not maintained for the investigation and/or the corrective action(s), as identified in the monitoring and record keeping requirements of this permit.

If no deviations/excursions occurred during a calendar quarter, the report shall so state that no deviations occurred during the reporting period.

- (2) The permittee shall submit quarterly deviation (excursion) reports which identify all exceedances of both the rolling, 12 month VOC input and emission limitations and, for the first 12 calendar months of operation or the first 12 calendar months following the issuance of this permit, all exceedances of the maximum allowable cumulative emission levels. These reports shall be submitted in accordance with the reporting requirements specified in Section A of the Standard Terms and Conditions of this permit.
 - (3) The permittee shall submit annual reports which specify the total VOC emissions from this emissions unit for the previous calendar year. These reports shall be submitted by January 31 of each year.
- f) Testing Requirements
- (1) The permittee may determine the VOC content of materials based on formulation data, and may rely on volatile matter content data provided by material suppliers. In the event of any inconsistency between the formulation data and the results of Test Methods 24 or 24A of 40CFR Part 60, Subpart A, Test Methods 24 or 24A shall be used unless the permittee can demonstrate to the satisfaction of the agency that the formulation data is correct.
 - (2) Emission Limitation:

Emissions of Volatile Organic Compounds (VOC) shall not exceed 4.71 lbs/hour.

Applicable Compliance Method:

Compliance with the VOC emission limitations in b)(1) shall be determined by emissions factors from AP-42, 6.4-1 (5/83), Uncontrolled emission factors for paint and varnish manufacturing.
 - (3) Emission limitation:

Emissions of Volatile Organic Compounds (VOC) shall not exceed 8.13 tons per year based on a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be determined based on recordkeeping in d).

(4) Emission Limitation:

Particulate emissions and emissions of particulate matter 10 microns and less in diameter (PE/PM10)* shall not exceed 0.10 pound per hour and 0.46 ton per year.

Particulate emissions shall not exceed 2.84 pounds per hour.

PE/PM10* shall not exceed 10 tons per year.

Applicable Compliance Method:

Compliance with the particulate emission limitations in b)(1) shall be determined by emission factors from AP-42 6.7-1 (5/83), Emission Factors for Printing Ink Manufacturing, and a dust collector capture efficiency of 90 percent and control efficiency of 99 percent.

If required, the permittee shall demonstrate compliance with the lb/hour emission limitation through emission tests performed in accordance with 40 CFR Part 60, Appendix A, Methods 1- 5.

Compliance with the 0.46 ton per year of PE limitation shall be determined based on recordkeeping in d)(1) by summing all the monthly records.

Compliance with the PM10 limitation is assumed with compliance with the PE limitations.

(5) Emission Limitation

The particulate emission rate at the control device outlet shall not exceed 0.030 grain of particulate emissions per dry standard cubic foot of exhaust gas or no visible particulate emissions from the exhaust stack, whichever is less stringent

Applicable compliance method:

If required, the permittee shall demonstrate compliance by emission testing in accordance with the procedures specified in 40 CFR Part 60, Appendix A, Methods 1 through 5 and the procedures specified in OAC rule 3745-17-03(B)(10).

Compliance may be determined through visible emission observations performed in accordance with U.S. EPA Method 9.

(6) Emission Limitation:

Visible particulate emissions shall not exceed 20 percent opacity, as a six-minute average, except as provided by the rule.

Applicable Compliance Method:

Compliance shall be determined through visible emission observations performed in accordance with U.S. EPA Method 9.

(7) Emission Limitation:

Fugitive visible particulate emissions shall not exceed 20 percent opacity, as a three-minute average, except as provided by the rule.

Applicable Compliance Method:

Compliance shall be determined through visible emission observations performed in accordance U.S. EPA Method 9 and the procedures specified in OAC rule 3745-17-03(B)(3).

g) Miscellaneous Requirements

(1) None.