



Environmental Protection Agency

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

5/17/2011

Brian Laycock  
ABX Air  
145 Hunter Drive  
CP-2  
Wilmington, OH 45177

RE: FINALAIR POLLUTION PERMIT-TO-INSTALL AND OPERATE  
Facility ID: 0514010124  
Permit Number: P0107527  
Permit Type: OAC Chapter 3745-31 Modification  
County: Clinton

Certified Mail

No	TOXIC REVIEW
No	PSD
No	SYNTHETIC MINOR TO AVOID MAJOR NSR
No	CEMS
No	MACT/GACT
No	NSPS
No	NESHAPS
No	NETTING
No	MAJOR NON-ATTAINMENT
No	MODELING SUBMITTED
Yes	SYNTHETIC MINOR TO AVOID TITLE V
Yes	FEDERALLY ENFORCABLE PTIO (FEPTIO)

Dear Permit Holder:

Enclosed please find a final Air Pollution Permit-to-Install and Operate (PTIO) which will allow you to install, modify, and/or operate the described emissions unit(s) in the manner indicated in the permit. Because this permit contains conditions and restrictions, please read it very carefully. Please complete a survey at [www.epa.ohio.gov/dapc/permitsurvey.aspx](http://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

If you have any questions, please contact Ohio EPA DAPC, Southwest District Office at (937)285-6357 or the Office of Compliance Assistance and Pollution Prevention at (614) 644-3469. This permit can be accessed electronically on the DAPCWeb page, [www.epa.ohio.gov/dapc](http://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: Ohio EPA-SWDO





## Response to Comments

Response to comments for: Permit-To-Install and Operate

Facility ID:	0514010124
Facility Name:	ABX Air
Facility Description:	ABX
Facility Address:	145 HUNTER DR WILMINGTON, OH 45177 Clinton County
Permit #:	P0107527, OAC Chapter 3745-31 Modification
A public notice for the draft permit issuance was published in the Ohio EPA Weekly Review and appeared in the The News Journal on 04/15/2011. The comment period ended on 05/15/2011.	
Hearing date (if held)	
Hearing Public Notice Date (if different from draft public notice)	

The following comments were received during the comment period specified. Ohio EPA reviewed and considered all comments received during the public comment period. By law, Ohio EPA has authority to consider specific issues related to protection of the environment and public health. Often, public concerns fall outside the scope of that authority. For example, concerns about zoning issues are addressed at the local level. Ohio EPA may respond to those concerns in this document by identifying another government agency with more direct authority over the issue.

In an effort to help you review this document, the questions are grouped by topic and organized in a consistent format. PDF copies of the original comments in the format submitted are available upon request.

1. Topic: **None**
  - a. Comment: **None**
  - b. Response: **None**
2. Topic: **None**
  - a. Comment: **None**
  - b. Response: **None**





**FINAL**

**Division of Air Pollution Control  
Permit-to-Install and Operate  
for  
ABX Air**

Facility ID:	0514010124
Permit Number:	P0107527
Permit Type:	OAC Chapter 3745-31 Modification
Issued:	5/17/2011
Effective:	5/17/2011
Expiration:	11/3/2014





Division of Air Pollution Control
Permit-to-Install and Operate
for
ABX Air

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## Authorization

Facility ID: 0514010124

Application Number(s): A0041080

Permit Number: P0107527

Permit Description: Permit is to allow more flexible coatings usage throughout the facility and allow for more flexible operations to address changing business climate.

Permit Type: OAC Chapter 3745-31 Modification

Permit Fee: \$800.00

Issue Date: 5/17/2011

Effective Date: 5/17/2011

Expiration Date: 11/3/2014

Permit Evaluation Report (PER) Annual Date: Jan 1 - Dec 31, Due Feb 15

This document constitutes issuance to:

ABX Air  
145 HUNTER DR  
WILMINGTON, OH 45177

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

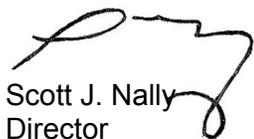
Ohio EPA District Office or local air agency responsible for processing and administering your permit:

Ohio EPA DAPC, Southwest District Office  
401 East Fifth Street  
Dayton, OH 45402  
(937)285-6357

The above named entity is hereby granted this Permit-to-Install and Operate for the air contaminant source(s) (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 described emissions unit(s) will operate in compliance with applicable State and federal laws and regulations.

This permit is granted subject to the conditions attached hereto.

Ohio Environmental Protection Agency



Scott J. Nally  
Director



## Authorization (continued)

Permit Number: P0107527

Permit Description: Permit is to allow more flexible coatings usage throughout the facility and allow for more flexible operations to address changing business climate.

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

<b>Emissions Unit ID:</b>	<b>K012</b>
Company Equipment ID:	K012
Superseded Permit Number:	
General Permit Category and Type:	Not Applicable

**Group Name: Hanger coating 80 gals per wk**

<b>Emissions Unit ID:</b>	<b>K004</b>
Company Equipment ID:	K004
Superseded Permit Number:	P0105163
General Permit Category and Type:	Not Applicable
<b>Emissions Unit ID:</b>	<b>K010</b>
Company Equipment ID:	K010
Superseded Permit Number:	P0105163
General Permit Category and Type:	Not Applicable
<b>Emissions Unit ID:</b>	<b>K013</b>
Company Equipment ID:	K003
Superseded Permit Number:	
General Permit Category and Type:	Not Applicable

## **A. Standard Terms and Conditions**

**1. What does this permit-to-install and operate ("PTIO") allow me to do?**

This permit allows you to install and operate the emissions unit(s) identified in this PTIO. You must install and operate the unit(s) in accordance with the application you submitted and all the terms and conditions contained in this PTIO, including emission limits and those terms that ensure compliance with the emission limits (for example, operating, recordkeeping and monitoring requirements).

**2. Who is responsible for complying with this permit?**

The person identified on the "Authorization" page, above, is responsible for complying with this permit until the permit is revoked, terminated, or transferred. "Person" means a person, firm, corporation, association, or partnership. The words "you," "your," or "permittee" refer to the "person" identified on the "Authorization" page above.

The permit applies only to the emissions unit(s) identified in the permit. If you install or modify any other equipment that requires an air permit, you must apply for an additional PTIO(s) for these sources.

**3. What records must I keep under this permit?**

You must keep all records required by this permit, including monitoring data, test results, strip-chart recordings, calibration data, maintenance records, and any other record required by this permit for five years from the date the record was created. You can keep these records electronically, provided they can be made available to Ohio EPA during an inspection at the facility. Failure to make requested records available to Ohio EPA upon request is a violation of this permit requirement.

**4. What are my permit fees and when do I pay them?**

There are two fees associated with permitted air contaminant sources in Ohio:

- PTIO fee. This one-time fee is based on a fee schedule in accordance with Ohio Revised Code (ORC) section 3745.11, or based on a time and materials charge for permit application review and permit processing if required by the Director.

You will be sent an invoice for this fee after you receive this PTIO and payment is due within 30 days of the invoice date. You are required to pay the fee for this PTIO even if you do not install or modify your operations as authorized by this permit.

- Annual emissions fee. Ohio EPA will assess a separate fee based on the total annual emissions from your facility. You self-report your emissions in accordance with Ohio Administrative Code (OAC) Chapter 3745-78. This fee assessed is based on a fee schedule in ORC section 3745.11 and funds Ohio EPA's permit compliance oversight activities. Unless otherwise specified, facilities subject to one or more synthetic minor restrictions must use Ohio EPA's "Air Services" to submit annual emissions associated with this permit requirement. Ohio EPA will notify you when it is time to report your emissions and to pay your annual emission fees.

**5. When does my PTIO expire, and when do I need to submit my renewal application?**

This permit expires on the date identified at the beginning of this permit document (see "Authorization" page above) and you must submit a renewal application to renew the permit. Ohio EPA will send a renewal notice to you approximately six months prior to the expiration date of this permit. However, it is

very important that you submit a complete renewal permit application (postmarked prior to expiration of this permit) even if you do not receive the renewal notice.

If a complete renewal application is submitted before the expiration date, Ohio EPA considers this a timely application for purposes of ORC section 119.06, and you are authorized to continue operating the emissions unit(s) covered by this permit beyond the expiration date of this permit until final action is taken by Ohio EPA on the renewal application.

**6. What happens to this permit if my project is delayed or I do not install or modify my source?**

This PTIO expires 18 months after the issue date identified on the "Authorization" page above unless otherwise specified if you have not (1) started constructing the new or modified emission sources identified in this permit, or (2) entered into a binding contract to undertake such construction. This deadline can be extended by up to 12 months, provided you apply to Ohio EPA for this extension within a reasonable time before the 18-month period has ended and you can show good cause for any such extension.

**7. What reports must I submit under this permit?**

An annual permit evaluation report (PER) is required in addition to any malfunction reporting required by OAC rule 3745-15-06 or other specific rule-based reporting requirement identified in this permit. Your PER due date is identified in the Authorization section of this permit.

**8. If I am required to obtain a Title V operating permit in the future, what happens to the operating provisions and PER obligations under this permit?**

If you are required to obtain a Title V permit under OAC Chapter 3745-77 in the future, the permit-to-operate portion of this permit will be superseded by the issued Title V permit. From the effective date of the Title V permit forward, this PTIO will effectively become a PTI (permit-to-install) in accordance with OAC rule 3745-31-02(B). The following terms and conditions will no longer be applicable after issuance of the Title V permit: Section B, Term 1.b) and Section C, for each emissions unit, Term a)(2).

The PER requirements in this permit remain effective until the date the Title V permit is issued and is effective, and cease to apply after the effective date of the Title V permit. The final PER obligation will cover operations up to the effective date of the Title V permit and must be submitted on or before the submission deadline identified in this permit on the last day prior to the effective date of the Title V permit.

**9. What are my obligations when I perform scheduled maintenance on air pollution control equipment?**

You must perform scheduled maintenance of air pollution control equipment in accordance with OAC rule 3745-15-06(A). If scheduled maintenance requires shutting down or bypassing any air pollution control equipment, you must also shut down the emissions unit(s) served by the air pollution control equipment during maintenance, unless the conditions of OAC rule 3745-15-06(A)(3) are met. Any emissions that exceed permitted amount(s) under this permit (unless specifically exempted by rule) must be reported as deviations in the annual permit evaluation report (PER), including nonexempt excess emissions that occur during approved scheduled maintenance.

**10. Do I have to report malfunctions of emissions units or air pollution control equipment? If so, how must I report?**

If you have a reportable malfunction of any emissions unit(s) or any associated air pollution control system, you must report this to the Ohio EPA DAPC, Southwest District Office in accordance with OAC rule 3745-15-06(B). Malfunctions that must be reported are those that result in emissions that exceed permitted emission levels. It is your responsibility to evaluate control equipment breakdowns and operational upsets to determine if a reportable malfunction has occurred.

If you have a malfunction, but determine that it is not a reportable malfunction under OAC rule 3745-15-06(B), it is recommended that you maintain records associated with control equipment breakdown or process upsets. Although it is not a requirement of this permit, Ohio EPA recommends that you maintain records for non-reportable malfunctions.

**11. Can Ohio EPA or my local air agency inspect the facility where the emission unit(s) is/are located?**

Yes. Under Ohio law, the Director or his authorized representative may inspect the facility, conduct tests, examine records or reports to determine compliance with air pollution laws and regulations and the terms and conditions of this permit. You must provide, within a reasonable time, any information Ohio EPA requests either verbally or in writing.

**12. What happens if one or more emissions units operated under this permit is/are shut down permanently?**

Ohio EPA can terminate the permit terms associated with any permanently shut down emissions unit. "Shut down" means 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.

You should notify Ohio EPA of any emissions unit that is permanently shut down by submitting<sup>1</sup> a certification that identifies the date on which the emissions unit was permanently shut down. The certification must be submitted by an authorized official from the facility. You cannot continue to operate an emissions unit once the certification has been submitted to Ohio EPA by the authorized official.

You must comply with all recordkeeping and reporting for any permanently shut down emissions unit in accordance with the provisions of the permit, regulations or laws that were enforceable during the period of operation, such as the requirement to submit a PER, air fee emission report, or malfunction report. You must also keep all records relating to any permanently shutdown emissions unit, generated while the emissions unit was in operation, for at least five years from the date the record was generated.

Again, you cannot resume operation of any emissions unit certified by the authorized official as being permanently shut down without first applying for and obtaining a permit pursuant to OAC Chapter 3745-31.

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<sup>1</sup> Permittees that use Ohio EPA's "Air Services" can mark the affected emissions unit(s) as "permanently shutdown" in the facility profile 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).

**13. Can I transfer this permit to a new owner or operator?**

You can transfer this permit to a new owner or operator. If you transfer the permit, you must follow the procedures in OAC Chapter 3745-31, including notifying Ohio EPA or the local air agency of the change in ownership or operator. Any transferee of this permit must assume the responsibilities of the transferor permit holder.

**14. Does compliance with this permit constitute compliance with OAC rule 3745-15-07, "air pollution nuisance"?**

This permit and OAC rule 3745-15-07 prohibit operation of the air contaminant source(s) regulated under this permit in a manner that causes a nuisance. Ohio EPA can require additional controls or modification of the requirements of this permit through enforcement orders or judicial enforcement action if, upon investigation, Ohio EPA determines existing operations are causing a nuisance.

**15. What happens if a portion of this permit is determined to be invalid?**

If a portion of this permit is determined to be invalid, the remainder of the terms and conditions remain valid and enforceable. The exception is where the enforceability of terms and conditions are dependent on the term or condition that was declared invalid.

## **B. Facility-Wide Terms and Conditions**

**Final Permit-to-Install and Operate**

ABX Air

**Permit Number:** P0107527

**Facility ID:** 0514010124

**Effective Date:** 5/17/2011

1. This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).
  - a) For the purpose of a permit-to-install document, the facility-wide terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.
    - (1) None.
  - b) For the purpose of a permit-to-operate document, the facility-wide terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.
    - (1) None.

## **C. Emissions Unit Terms and Conditions**

**1. K012, Misc. Coating of metal and non-metal aircraft parts in CRO (2066)**

**Operations, Property and/or Equipment Description:**

Misc. Coating of metal and non-metal aircraft parts in CRO (2066).

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. b)(1)h., and d)(5) thru (7), below.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

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>Volatile organic compound (VOC) emissions shall not exceed 40 pounds per day and 7.3 tons per year from coatings employed.</p> <p>Particulate emissions (PE) shall not exceed 0.551 pounds per hour and 2.4 tons per year from coatings.</p> <p>Compliance with the emission limitations under OAC rule 3745-31-05(D)</p>
b.	OAC paragraph 3745-31-05(A)(3)(a)(ii), as effective 12/01/06	See section b)(2)b., below.
c.	OAC rule 3745-31-05(D) (Synthetic minor to avoid Title V requirements)	The rolling 12-month hazardous air pollutant (HAP) emissions from this facility shall be less than 10 tons for any individual HAP and 25 tons for all combined.

**Final Permit-to-Install and Operate**

ABX Air

**Permit Number:** P0107527**Facility ID:** 0514010124**Effective Date:** 5/17/2011

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
		The combined VOC emissions from the use of liquid organic cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 shall not exceed 9.4 tons per rolling 12-month period.
d.	OAC rule 3745-21-09(U)(2)(b)	Exempt from rule.
e.	OAC rule 3745-21-19	Exempt from rule.
f.	OAC rule 3745-17-11(C)	Use of overspray control system.
g.	OAC rule 3745-17-07(A)	Visible PE from this emissions unit shall not exceed 20% opacity, as a six - minute average, except as specified by rule.
h.	OAC rule 3745-114-01	Ohio Toxic Rule
i.	OAC rule 3745-21-07(G)(2)	When coating non-metal parts, the OC emissions from the use photochemically reactive liquid organic materials or substance containing photochemically reactive material shall not exceed 8 pounds per hour nor 40 pounds per day.

## (2) Additional Terms and Conditions

- a. The permittee has satisfied the Best Available Technology (BAT) requirements pursuant to 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 ORC changes effective August 3, 2006 (S.B. 265 changes), such that BAT is no longer required by State regulations for NAAQS pollutants less than ten tons per year. However, that rule revision has not yet been approved by the 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 the 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 3745-31-05, then these emission limits/control measures no longer apply.
- b. This 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, (SIP).
- The Best Available Technology (BAT) requirements under OAC rule 3745-31-05(A)(3) do not apply to the volatile organic compound (VOC) and particulate emissions (PE) emissions from this emissions unit since the emissions are less than ten tons per year.
- c. On February 1, 2008, OAC rule 3745-17-11 was revised to include paragraph (C), pertaining to control requirements for particulate emissions from surface coating processes. This operation is exempt from requirements under OAC rule

3745-17-11(C) due to the coating of large airplane parts, exempt under OAC rule 3745-17-11(A)(1)(I).

- d. On February 18, 2008, OAC rule 3745-21-07 was revised to delete paragraph (G); therefore, paragraph (G) is no longer part of the State regulations. However, that rule revision has not been approved by the U.S.EPA as a revision to Ohio's State Implementation Plan (SIP). Therefore, until the SIP revision occurs to OAC rule 3745-21-07, the requirement of the previous OAC rule 3745-21-07(G) still exists as part of the federally approved SIP for Ohio.

Once the February 18, 2008, revised OAC rule 3745-21-07, or modified version of OAC rule 3745-21-07 is approved by the U.S. EPA and Ohio's State Implementation Plan (SIP) is revised, the terms and conditions within this permit which are required by previous OAC rule 3745-21-07(G) will not be required and will not be federally and/or state enforceable.

Once the February 18, 2008, revised OAC rule 3745-21-07, or modified version of OAC rule 3745-21-07 is approved by the U.S. EPA and Ohio's State Implementation Plan (SIP) is revised, the permittee shall take immediate steps to assure compliance with any and all requirements of the revised OAC rule and/or SIP.

- e. OAC rule 3745-21-09(U)(2)(b) exempts the exterior coating of airplanes from the requirements of OAC rule 3745-21-09(U)(1).
- f. This facility is located in Clinton County which is not a listed county under OAC rule 3745-21-19(A)(1).

c) **Operational Restrictions**

- (1) The materials employed in this emissions unit shall not exceed the following:
  - a. The daily coating usage of 5.0 gallons; and
  - b. The maximum coating volatile organic compound (VOC) content of 8.0 pounds per gallon, as applied.
- (2) The combined liquid organic cleanup material employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 shall not exceed the following:
  - a. The rolling 12-month liquid organic cleanup material usage of 2,500 gallons; and
  - b. The maximum liquid organic cleanup material volatile organic compound (VOC) content of 7.5 pounds per gallon.
- (3) The permittee shall maintain an enclosure that controls the particulate emissions (PE) whenever this emissions unit is in operation. The enclosure shall be maintained in such a manner in order to minimize and/or eliminate the release of overspray into the ambient air.

d) Monitoring and/or Recordkeeping Requirements

- (1) The permittee shall collect and record the following information each day for this emissions unit:
  - a. The name and identification number of each coating employed;
  - b. The VOC content of each coating employed, in pounds per gallon, as applied;
  - c. The number of gallons of each coating employed;
  - d. The total number of gallons of all the coatings employed; and
  - e. The total VOC emissions from all the coatings employed, in pounds [i.e., the sum of d)(2)b. times d)(2)c. for each coating employed].
  
- (2) The permittee shall collect and record the following information for each month for the cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013:
  - a. the company identification for each coating and clean-up material employed;
  - b. the number of gallons of each clean-up material employed. The clean-up material employed may be based on purchasing records or actual usage tracking;
  - c. the VOC/OC content of clean-up material, in pounds per gallon;
  - d. the total combined VOC generated clean-up materials employed, in tons per month;
  - e. the amount of clean-up material recovered, in gallons;
  - f. the VOC content of recovered clean-up material, in percent by volume;
  - g. the estimated amount of clean-up material recovered, in gallons, (the summation of: ("e" x "f"));
  - h. the total amount of VOC/OC material recovered, in tons per month, (the summation of: [("g" x 7.5 pounds of gallon\*)/ 2000]);
  - i. the total combined monthly VOC/OC emissions, in tons per month, (the summation of: ("d" - "h")); and
  - j. the total combined rolling, 12-month summation VOC/OC emissions, in tons. The rolling, 12-month summation of the total VOC/OC emissions (the total amount of VOC/OC emissions for the current month ("i") plus the total amount of VOC/OC emissions for the 11 previous calendar months).

\* This assumed VOC content of 7.5 pounds per gallon is lower than VOC content of the clean-up solvents that will be employed at this facility and will be used to represent the worst case emissions as based on the facility's application.VOC/OC emission rates

calculated based on purchasing records are assumed to represent the worst case actual emissions and may be used to demonstrate compliance with the above list VOC/OC emission limitations, in section b)(1).

- (3) This facility shall maintain the following daily records if any material employed is by definition photo chemically reactive material "PRM" or contains a substance that is by definition "PRM" during any time when non-metal parts are being coated in this emissions unit:
- a. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the amount of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in gallons;
  - b. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the organic compound content of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in lbs/gal;
  - c. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the organic compound (OC) emissions of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in lbs of OC/day ("a" x "b");
  - d. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the total number of hours this emission unit was used to coat non-metal parts, in hours/day; and
  - e. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the estimated hourly OC emission rate while coating non-metal parts, in lbs of OC/hr ("c"/"d").
- (4) The permittee shall collect and record the following information each month for all emissions units at this facility, including emissions from units not listed or specifically addressed in this permit:
- a. the company identification for each HAP-emitting material (i.e., all HAP-containing coatings, clean-up materials, resins, adhesives, potting compounds, plating chemicals, etc.);
  - b. the individual HAP content of each HAP emitting material;
  - c. the total combined HAP content of each HAP emitting material (i.e. sum of individual HAP contents from b);
  - d. the amount of each HAP emitting material employed during the previous calendar month;
  - e. the hours of operation, or other emissions determining rationale, of all HAP-generating sources (e.g., fuel combustion, sanding/grinding operations, plating);
  - f. the total individual HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in pounds or tons per month;

- g. the total combined HAP emissions from all HAP emitting materials employed and all HAP-generating sources, in pounds or tons per month;
  - h. the rolling, 12-month summation of individual HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in tons; and
  - i. the rolling, 12-month summation of total combined HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in tons.
- (5) This permit was evaluated based on the materials and the design parameters of the emissions unit, as specified by the permittee. The "Toxic Air Contaminant Statute", ORC 3704.03(F), was applied to this emissions unit 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 using an air dispersion model such as SCREEN3, 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.
  - b. The TLV is divided by ten to adjust the standard from the working population to the general public (TLV/10).
  - c. This standard is/was then adjusted to account for the duration of the exposure or the operating hours of the emissions unit(s), i.e., "X" hours per day and "Y" 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 or “worst case” toxic contaminant(s):

Pollutant: Styrene

TLV (mg/m<sup>3</sup>): 85.2

Maximum Hourly Emission Rate (lbs/hr): 40.0

Predicted 1-Hour Maximum Ground-Level Concentration (ug/m<sup>3</sup>): 1,783.0

MAGLC (ug/m<sup>3</sup>): 2,028.6

The permittee, having demonstrated that emissions, from emissions unit K001, is estimated to be equal or greater than eighty per cent, but less than 100 per cent of the maximum acceptable ground level concentration (MAGLC), shall not operate the emissions unit at a rate that would exceed the daily emissions rate, process weight rate, and/or restricted hours of operations, as allowed in this permit; and 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).

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

- (6) 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:
- a. 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;
  - b. 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
  - c. 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”, ORC 3704.03(F), 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”, the permittee shall apply for and obtain a final FEPTIO prior

to the change. The Director may consider any significant departure from the operations of the emissions unit, described in the permit application, as a modification that results in greater emissions than the emissions rate modeled to determine the ground level concentration; and he/she may require the permittee to submit a permit application for the increased emissions.

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

- (7) The permittee shall collect, record, and retain the following information for each toxic evaluation conducted to determine compliance with the "Toxic Air Contaminant Statute":
- a. 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.

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

e) Reporting Requirements

- (1) The permittee shall submit quarterly deviation (excursion) reports that identify the following:
- a. The daily coating usage greater than 5.0 gallons;
  - b. The volatile organic compound (VOC) content greater than 8.0 pounds per gallon of coating, as applied;
  - c. The combined liquid organic cleanup material employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 greater than 2,500 gallons per rolling 12 month, period;
  - d. The volatile organic compound (VOC) content greater than 7.5 pounds per gallon of liquid organic cleanup material;

- e. The rolling 12 month facility-wide individual HAP emissions equal to or greater than 10 tons; and
- f. The rolling 12 month facility-wide combined HAP's emissions equal to or greater than 25 tons.

The quarterly deviation (excursion) reports shall be submitted in accordance with the reporting requirements of the Standard Terms and Conditions of this permit.

[OAC rule 3745-15-03(B)(1)(a)], [OAC rule 3745-15-03(C)], and [OAC rule 3745-77-07(A)(3)(c)]

- (2) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.

[OAC rule 3745-15-03(B)(2)] and [OAC rule 3745-15-03(D)].

f) Testing Requirements

- (1) Compliance with the emission limitations in b) shall be determined in accordance with the following methods:

- a. Emissions Limitation:

5 gallons per day total coating usage

Applicable Compliance Method:

Compliance shall be based upon the record keeping in section d), of this permit.

- b. Emissions Limitation:

40 lbs. per day of VOC/PRM emissions from coatings

Applicable Compliance Method:

Compliance shall be based upon the record keeping section d)(1), of this permit.

- c. Emissions Limitation:

7.3 TPY of VOC emissions from coatings employed in this emissions unit.

Applicable Compliance Method:

Compliance shall be assumed based on the daily emissions being maintained below 40 pounds of VOC per day.

d. Emissions Limitation:

9.4 TPY of combined VOC emissions from liquid organic cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013.

Applicable Compliance Method:

Compliance shall be based upon the record keeping in section d)(2), of this permit.

e. Emission Limitation:

0.551 lb per hour and 2.41 tons per year of particulate emissions (PE).

The above limitation is based on the following equation:

$$HER = Cu \times (1-TE) \times (1-CE)$$

$$AER = (HER \times 8760) / 2000$$

Where:

HER = Hourly Emission Rate, in pounds per hour;

Cu = maximum coating solids usage rate, in pounds per hour,

TE = fractional transfer efficiency, which is the ratio of the amount of coating solids deposited on the coated part to the amount of coating solids used (0.55); and

CE = fractional control efficiency of the control equipment (0.99).

Applicable Compliance Method:

When requested by the Ohio EPA, the permittee shall demonstrate compliance with the above emissions limitation pursuant to OAC rule 3745-17-03 (B)(10).

f. Emission Limitation:

Visible PE from this emissions unit shall not exceed 20% opacity, as a six-minute average, except as specified by rule.

Applicable Compliance Method:

When requested by the Ohio EPA, compliance with the above visible emission limitation shall be determined by visible emission evaluations performed in accordance with OAC rule 3745-17-03(B)(1) using the methods and procedures specified in USEPA Reference Method 9.

g. Emission Limitation -

The emission of hazardous air pollution (HAP) shall be less than 10 tons for any individual HAP and 25 tons for all combined based on rolling 12-month period.

Applicable Compliance Method:

Compliance shall be based upon the record keeping in section d)(4), of this permit.

g) Miscellaneous Requirements

(1) None.

2. Emissions Unit Group -Hanger coating 80 gals per wk: K004, K010, K013,

EU ID	Operations, Property and/or Equipment Description
K004	Hangar 1004 Miscellaneous Coating Operations for Metal and Non-metal Parts (Terms in this permit supersede those identified in PTI 05-8360 issued on 3/19/97, and in PTI 05-10567 issued on 1/4/01.)
K010	Hangar 1005 Miscellaneous Coating Operation for Metal and Non-metal Parts (Terms in this permit supersede those identified in PTI 05-10567 issued on 1/4/01.)
K013	Aircraft Hanger 1003

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. b)(1)i., and d)(5) thru (7), below.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

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.	ORC 3704.03(T)	<p>Volatile organic compound (VOC) emissions shall not exceed 640 pounds per week and 16.64 tons per year from coatings employed.</p> <p>Compliance with the emission limitations under OAC rule 3745-31-05(D)</p>
b.	OAC rule 3745-31-05(A)(3) As effective 11/30/01	Particulate emissions (PE) shall not exceed 0.551 pounds per hour and 2.4 tons per year from coatings.
c.	OAC paragraph 3745-31-05(A)(3)(a)(ii), as effective 12/01/06	See section b)(2)b., below.

**Final Permit-to-Install and Operate**

ABX Air

**Permit Number:** P0107527**Facility ID:** 0514010124**Effective Date:** 5/17/2011

d.	OAC rule 3745-31-05(D) (Synthetic minor to avoid Title V requirements)	The rolling 12-month hazardous air pollutant (HAP) emissions from this facility shall be less than 10 tons for any individual HAP and 25 tons for all combined.  The combined VOC emissions from the use of liquid organic cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 shall not exceed 9.4 tons per rolling 12-month period.
e.	OAC rule 3745-21-09(U)(2)(b)	Exempt from rule.
f.	OAC rule 3745-21-19	Exempt from rule.
g.	OAC rule 3745-17-11(C)	Use of overspray control system.
h.	OAC rule 3745-17-07(A)	Visible PE from this emissions unit shall not exceed 20% opacity, as a six - minute average, except as specified by rule.
i.	OAC rule 3745-114-01	Ohio Toxic Rule
j.	OAC rule 3745-21-07(G)(2)	When coating non-metal parts, the OC emissions from the use photochemically reactive liquid organic materials or substance containing photochemically reactive material shall not exceed 8 pounds per hour nor 40 pounds per day.

## (2) Additional Terms and Conditions

- a. The permittee has satisfied the Best Available Technology (BAT) requirements pursuant to 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 ORC changes effective August 3, 2006 (S.B. 265 changes), such that BAT is no longer required by State regulations for NAAQS pollutants less than ten tons per year. However, that rule revision has not yet been approved by the 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 the 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 3745-31-05, then these emission limits/control measures no longer apply.
- b. This 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, (SIP).

The Best Available Technology (BAT) requirements under OAC rule 3745-31-05(A)(3) do not apply to the particulate emissions (PE) emissions from this emissions unit since the emissions are less than ten tons per year.

- c. On February 1, 2008, OAC rule 3745-17-11 was revised to include paragraph (C), pertaining to control requirements for particulate emissions from surface coating processes. This operation is exempt from requirements under OAC rule 3745-17-11(C) due to the coating of large airplane parts, exempt under OAC rule 3745-17-11(A)(1)(l).
- d. On February 18, 2008, OAC rule 3745-21-07 was revised to delete paragraph (G); therefore, paragraph (G) is no longer part of the State regulations. However, that rule revision has not been approved by the U.S.EPA as a revision to Ohio's State Implementation Plan (SIP). Therefore, until the SIP revision occurs to OAC rule 3745-21-07, the requirement of the previous OAC rule 3745-21-07(G) still exists as part of the federally approved SIP for Ohio.

Once the February 18, 2008, revised OAC rule 3745-21-07, or modified version of OAC rule 3745-21-07 is approved by the U.S. EPA and Ohio's State Implementation Plan (SIP) is revised, the terms and conditions within this permit which are required by previous OAC rule 3745-21-07(G) will not be required and will not be federally and/or state enforceable.

Once the February 18, 2008, revised OAC rule 3745-21-07, or modified version of OAC rule 3745-21-07 is approved by the U.S. EPA and Ohio's State Implementation Plan (SIP) is revised, the permittee shall take immediate steps to assure compliance with any and all requirements of the revised OAC rule and/or SIP.

- e. OAC rule 3745-21-09(U)(2)(b) exempts the exterior coating of airplanes from the requirements of OAC rule 3745-21-09(U)(1).
- f. This facility is located in Clinton County which is not a listed county under OAC rule 3745-21-19(A)(1).

c) **Operational Restrictions**

- (1) The materials employed in this emissions unit shall not exceed the following:
  - a. The weekly coating usage of 80.0 gallons; and
  - b. The maximum coating volatile organic compound (VOC) content of 8.0 pounds per gallon, as applied.
- (2) The combined liquid organic cleanup material employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 shall not exceed the following:
  - a. The rolling 12-month liquid organic cleanup material usage of 2,500 gallons; and
  - b. The maximum liquid organic cleanup material volatile organic compound (VOC) content of 7.5 pounds per gallon.

- (3) The permittee shall maintain an enclosure that controls the particulate emissions (PE) whenever this emissions unit is in operation. The enclosure shall be maintained in such a manner in order to minimize and/or eliminate the release of overspray into the ambient air.
- d) **Monitoring and/or Recordkeeping Requirements**
- (1) The permittee shall collect and record the following information each week for this emissions unit:
- a. The name and identification number of each coating employed;
  - b. The VOC content of each coating employed, in pounds per gallon, as applied;
  - c. The number of gallons of each coating employed;
  - d. The total number of gallons of all the coatings employed; and
  - e. The total VOC emissions from all the coatings employed, in pounds [i.e., the sum of d)(2)b. times d)(2)c. for each coating employed].
- (2) The permittee shall collect and record the following information for each month for the cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013:
- a. the company identification for each coating and clean-up material employed;
  - b. the number of gallons of each clean-up material employed. The clean-up material employed may be based on purchasing records or actual usage tracking;
  - c. the VOC/OC content of clean-up material, in pounds per gallon;
  - d. the total combined VOC generated clean-up materials employed, in tons per month;
  - e. the amount of clean-up material recovered, in gallons;
  - f. the VOC content of recovered clean-up material, in percent by volume;
  - g. the estimated amount of clean-up material recovered, in gallons, (the summation of: ("e" x "f"));
  - h. the total amount of VOC/OC material recovered, in tons per month, (the summation of: [("g" x 7.5 pounds of gallon\*)/ 2000]);
  - i. the total combined monthly VOC/OC emissions, in tons per month, (the summation of: ("d" - "h"); and
  - j. the total combined rolling, 12-month summation VOC/OC emissions, in tons. The rolling, 12-month summation of the total VOC/OC emissions (the total

amount of VOC/OC emissions for the current month ("i") plus the total amount of VOC/OC emissions for the 11 previous calendar months).

\* This assumed VOC content of 7.5 pounds per gallon is lower than VOC content of the clean-up solvents that will be employed at this facility and will be used to represent the worst case emissions as based on the facility's application. VOC/OC emission rates calculated based on purchasing records are assumed to represent the worst case actual emissions and may be used to demonstrate compliance with the above list VOC/OC emission limitations, in section b)(1).

- (3) This facility shall maintain the following daily records if any material employed is by definition photo chemically reactive material "PRM" or contains a substance that is by definition "PRM" during any time when non-metal parts are being coated in this emissions unit:
- a. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the amount of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in gallons;
  - b. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the organic compound content of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in lbs/gal;
  - c. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the organic compound (OC) emissions of each "PRM" material or "PRM" containing material employed while coating non-metal parts, in lbs of OC/day ("a" x "b");
  - d. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the total number of hours this emission unit was used to coat non-metal parts, in hours/day; and
  - e. if any material employed is by definition "PRM" or contains a substance that is by definition "PRM", the estimated hourly OC emission rate while coating non-metal parts, in lbs of OC/hr ("c"/"d").
- (4) The permittee shall collect and record the following information each month for all emissions units at this facility, including emissions from units not listed or specifically addressed in this permit:
- a. the company identification for each HAP-emitting material (i.e., all HAP-containing coatings, clean-up materials, resins, adhesives, potting compounds, plating chemicals, etc.);
  - b. the individual HAP content of each HAP emitting material;
  - c. the total combined HAP content of each HAP emitting material (i.e. sum of individual HAP contents from b);

- d. the amount of each HAP emitting material employed during the previous calendar month;
  - e. the hours of operation, or other emissions determining rationale, of all HAP-generating sources (e.g., fuel combustion, sanding/grinding operations, plating);
  - f. the total individual HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in pounds or tons per month;
  - g. the total combined HAP emissions from all HAP emitting materials employed and all HAP-generating sources, in pounds or tons per month;
  - h. the rolling, 12-month summation of individual HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in tons; and
  - i. the rolling, 12-month summation of total combined HAP emissions from all HAP-emitting materials employed and all HAP-generating sources, in tons.
- (5) This permit was evaluated based on the materials and the design parameters of the emissions unit, as specified by the permittee. The "Toxic Air Contaminant Statute", ORC 3704.03(F), was applied to this emissions unit 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 using an air dispersion model such as SCREEN3, 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.
  - b. The TLV is divided by ten to adjust the standard from the working population to the general public (TLV/10).

- c. This standard is/was then adjusted to account for the duration of the exposure or the operating hours of the emissions unit(s), i.e., “X” hours per day and “Y” 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 or “worst case” toxic contaminant(s):

Pollutant: Styrene

TLV (mg/m<sup>3</sup>): 85.2

Maximum Hourly Emission Rate (lbs/hr): 40.0

Predicted 1-Hour Maximum Ground-Level Concentration (ug/m<sup>3</sup>): 1,783.0

MAGLC (ug/m<sup>3</sup>): 2,028.6

The permittee, having demonstrated that emissions, from emissions unit K001, is estimated to be equal or greater than eighty per cent, but less than 100 per cent of the maximum acceptable ground level concentration (MAGLC), shall not operate the emissions unit at a rate that would exceed the daily emissions rate, process weight rate, and/or restricted hours of operations, as allowed in this permit; and 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).

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

- (6) 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:
- a. 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;
  - b. 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
  - c. 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", ORC 3704.03(F), 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", the permittee shall apply for and obtain a final PTIO prior to the change. The Director may consider any significant departure from the operations of the emissions unit, described in the permit application, as a modification that results in greater emissions than the emissions rate modeled to determine the ground level concentration; and he/she may require the permittee to submit a permit application for the increased emissions.

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

- (7) The permittee shall collect, record, and retain the following information for each toxic evaluation conducted to determine compliance with the "Toxic Air Contaminant Statute":
- a. 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.

[ORC 3704.03(F)(3)(c) and F(4)], [OAC rule 3745-114-01], Option A, Engineering Guide #70

e) Reporting Requirements

- (1) The permittee shall submit quarterly deviation (excursion) reports that identify the following:
- a. The weekly coating usage greater than 80.0 gallons;
  - b. The volatile organic compound (VOC) content greater than 8.0 pounds per gallon of coating, as applied;

- c. The combined liquid organic cleanup material employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013 greater than 2,500 gallons per rolling 12 month, period;
- d. The volatile organic compound (VOC) content greater than 7.5 pounds per gallon of liquid organic cleanup material;
- e. The organic compound emissions exceeds 8 pounds per hour and 40 pounds per day, when photochemically reactive materials are employed;
- f. The rolling 12 month facility-wide individual HAP emissions equal to or greater than 10 tons; and
- g. The rolling 12 month facility-wide combined HAP's emissions equal to or greater than 25 tons.

The quarterly deviation (excursion) reports shall be submitted in accordance with the reporting requirements of the Standard Terms and Conditions of this permit.

[OAC rule 3745-15-03(B)(1)(a)], [OAC rule 3745-15-03(C)], and [OAC rule 3745-77-07(A)(3)(c)]

- (2) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.

[OAC rule 3745-15-03(B)(2)] and [OAC rule 3745-15-03(D)].

f) Testing Requirements

- (1) Compliance with the emission limitations in b) shall be determined in accordance with the following methods:

- a. Emissions Limitation:

80 gallons per week total coating usage

Applicable Compliance Method:

Compliance shall based upon the record keeping in section d), of this permit.

- b. Emissions Limitation:

640 lbs. per week of VOC emissions from coatings

Applicable Compliance Method:

Compliance shall based upon the record keeping section d)(1), of this permit.

c. Emissions Limitation:

16.64 tons of VOC per year from coatings employed in this emissions unit.

Applicable Compliance Method:

Compliance shall be assumed based on the daily emissions being maintained below 640 pounds of VOC per week.

d. Emissions Limitation:

9.4 TPY of combined VOC emissions from liquid organic cleanup materials employed in emissions units K001, K004, K005, K006, K007, K010, K011, K012, and K013.

Applicable Compliance Method:

Compliance shall be based upon the record keeping in section d)(2), of this permit.

e. Emission Limitation:

0.551 lb per hour and 2.41 tons per year of particulate emissions (PE).

The above limitation is based on the following equation:

$$HER = Cu \times (1-TE) \times (1-CE)$$

$$AER = (HER \times 8760) / 2000$$

Where:

HER = Hourly Emission Rate, in pounds per hour;

Cu = maximum coating solids usage rate, in pounds per hour,

TE = fractional transfer efficiency, which is the ratio of the amount of coating solids deposited on the coated part to the amount of coating solids used (0.55); and

CE = fractional control efficiency of the control equipment (0.99).

Applicable Compliance Method:

When requested by the Ohio EPA, the permittee shall demonstrate compliance with the above emissions limitation pursuant to OAC rule 3745-17-03 (B)(10).

f. Emission Limitation:

Visible PE from this emissions unit shall not exceed 20% opacity, as a six-minute average, except as specified by rule.

Applicable Compliance Method:

When requested by the Ohio EPA, compliance with the above visible emission limitation shall be determined by visible emission evaluations performed in accordance with OAC rule 3745-17-03(B)(1) using the methods and procedures specified in USEPA Reference Method 9.

g. Emission Limitation -

The emission of hazardous air pollution (HAP) shall be less than 10 tons for any individual HAP and 25 tons for all combined based on rolling 12-month period.

Applicable Compliance Method:

Compliance shall based upon the record keeping in section d)(4), of this permit.

h. Emission Limitation -

The emission of organic compounds (OC) when employing photochemically reactive materials (PRM's) shall not exceed 8 pounds per hour and 40 pounds per day.

Applicable Compliance Method:

Compliance shall based upon the record keeping in section d)(3), of this permit.

g) Miscellaneous Requirements

(1) None.