



Environmental Protection Agency

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

5/8/2012

PETER RAO
Cleveland Steel Container Corp - Streetsboro
10048 Aurora Hudson Rd
Streetsboro, OH 44241

RE: FINALAIR POLLUTION PERMIT-TO-INSTALL AND OPERATE
Facility ID: 1667080028
Permit Number: P0108936
Permit Type: Renewal
County: Portage

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)
No	SYNTHETIC MINOR TO AVOID MAJOR GHG

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 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 Akron Regional Air Quality Management District at (330)375-2480 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, by clicking the "Issued Air Pollution Control Permits" link.

Sincerely,

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

Cc: ARAQMD



FINAL

**Division of Air Pollution Control
Permit-to-Install and Operate
for
Cleveland Steel Container Corp - Streetsboro**

Facility ID:	1667080028
Permit Number:	P0108936
Permit Type:	Renewal
Issued:	5/8/2012
Effective:	5/8/2012
Expiration:	5/8/2017



Division of Air Pollution Control
Permit-to-Install and Operate
for
Cleveland Steel Container Corp - Streetsboro

Table of Contents

Authorization 1
A. Standard Terms and Conditions 3
1. What does this permit-to-install and operate ("PTIO") allow me to do?..... 4
2. Who is responsible for complying with this permit? 4
3. What records must I keep under this permit? 4
4. What are my permit fees and when do I pay them?..... 4
5. When does my PTIO expire, and when do I need to submit my renewal application? 4
6. What happens to this permit if my project is delayed or I do not install or modify my source? 5
7. What reports must I submit under this permit? 5
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? 5
9. What are my obligations when I perform scheduled maintenance on air pollution control equipment? ... 5
10. Do I have to report malfunctions of emissions units or air pollution control equipment? If so, how must I report? 6
11. Can Ohio EPA or my local air agency inspect the facility where the emission unit(s) is/are located? 6
12. What happens if one or more emissions units operated under this permit is/are shut down permanently? 6
13. Can I transfer this permit to a new owner or operator?..... 7
14. Does compliance with this permit constitute compliance with OAC rule 3745-15-07, "air pollution nuisance"? 7
15. What happens if a portion of this permit is determined to be invalid? 7
B. Facility-Wide Terms and Conditions..... 8
C. Emissions Unit Terms and Conditions 11
1. K001, Roll Coater Paint Line 12
2. Emissions Unit Group - Hand Cover Lines: K003, K004..... 31
3. Emissions Unit Group - Auto Cover Lines: K005, K006..... 41
4. Emissions Unit ID: K007, Cover Line 50
5. K008, Spray Lining Paint Line 55

Authorization

Facility ID: 1667080028
Application Number(s): A0042013, A0042945, A0043564
Permit Number: P0108936
Permit Description: FEPTIO Renewal permit for metal barrel, drum, and pail manufacturing equipment.
Permit Type: Renewal
Permit Fee: \$0.00
Issue Date: 5/8/2012
Effective Date: 5/8/2012
Expiration Date: 5/8/2017
Permit Evaluation Report (PER) Annual Date: Jan 1 - Dec 31, Due Feb 15

This document constitutes issuance to:

Cleveland Steel Container Corp - Streetsboro
10048 Aurora Hudson Rd
Streetsboro, OH 44241

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

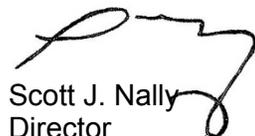
Ohio EPA District Office or local air agency responsible for processing and administering your permit:

Akron Regional Air Quality Management District
146 South High Street, Room 904
Akron, OH 44308
(330)375-2480

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: P0108936

Permit Description: FEPTIO Renewal permit for metal barrel, drum, and pail manufacturing equipment.

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

Emissions Unit ID: K001
Company Equipment ID: Roll Coater Paint Line
Superseded Permit Number: 16-02157
General Permit Category and Type: Not Applicable

Emissions Unit ID: K007
Company Equipment ID: Cover Line
Superseded Permit Number: 16-02157
General Permit Category and Type: Not Applicable

Emissions Unit ID: K008
Company Equipment ID: Spray Lining Paint Line
Superseded Permit Number: 16-02157
General Permit Category and Type: Not Applicable

Group Name: Auto Cover Lines

Emissions Unit ID:	K005
Company Equipment ID:	UN Auto Cover Line
Superseded Permit Number:	16-02157
General Permit Category and Type:	Not Applicable
Emissions Unit ID:	K006
Company Equipment ID:	Standard Auto Cover Line
Superseded Permit Number:	16-02157
General Permit Category and Type:	Not Applicable

Group Name: Hand Cover Lines

Emissions Unit ID:	K003
Company Equipment ID:	UN Hand Cover Line
Superseded Permit Number:	16-02157
General Permit Category and Type:	Not Applicable
Emissions Unit ID:	K004
Company Equipment ID:	Standard Hand Cover Line
Superseded Permit Number:	16-02157
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 Akron Regional Air Quality Management District 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 submitting¹ 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.

¹Permittees 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

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) B.1.c) through B.1.f).
 - c) Federally enforceable permit-to-install and operate (FEPTIO) P0108936 takes into account the following voluntary emissions limitations, as proposed by the permittee, for the purpose of avoiding the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Surface Coating of Miscellaneous Metal Parts and Products requirements under 40 CFR Part 63, Subpart Mmmm, as well as avoiding Title V applicability:
 - (1) volatile organic compound (VOC) emissions from this facility shall not exceed 72.56 tons per rolling, 12-month period;
 - (2) individual hazardous air pollutant (HAP) emissions from this facility shall not exceed 8.72 tons per rolling, 12-month period; and
 - (3) combined HAP emissions from this facility shall not exceed 17.25 tons per rolling, 12-month period.

These federally enforceable limitations are based on the operational restrictions for emissions units K001, K003, K004, K005, K006, K007, and K008. These emissions units have been in operation for more than 12 months and, as such, the permittee has existing records to generate the rolling, 12-month summations of emissions upon issuance of this permit.
 - d) The permittee shall maintain monthly records of the following facility-wide information:
 - (1) the rolling, 12-month summation of VOC emissions, in tons;
 - (2) the rolling, 12-month summation of individual HAP emissions, in tons; and
 - (3) the rolling, 12-month summation of combined HAP emissions, in tons.
 - e) The permittee shall submit quarterly deviation (excursion) reports that identify:

- (1) all deviations (excursions) of the following emission limitations, operational restrictions and/or control device operating parameter limitations that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit:
 - a. 72.56 tons of VOC per rolling, 12-month period;
 - b. 8.72 tons of individual HAP per rolling, 12-month period;
 - c. 17.25 tons of combined HAP per rolling, 12-month period;
- (2) the probable cause of each deviation (excursion);
- (3) any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
- (4) the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- f) Compliance with the allowable emissions limitations specified in section c) of these terms and conditions shall be determined in accordance with the following methods:

(1) Emissions Limitations:

72.56 tons of VOC per rolling, 12-month period

8.72 tons of individual HAP per rolling, 12-month period

17.25 tons of combined HAP per rolling, 12-month period

Applicable Compliance Method:

Compliance with the annual emissions limitations identified above shall be demonstrated by the monitoring and record keeping requirements in d).

C. Emissions Unit Terms and Conditions

1. K001, Roll Coater Paint Line

Operations, Property and/or Equipment Description:

Automatic steel sheet feeder, enclosed roll coater booth, 3-zone curing oven (5 MMBtu/hr), cooling zone, and automatic sheet stacker. Emissions are vented to a regenerative thermal oxidizer control device shared with emissions unit K008.

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. None.

(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. b)(1)b.

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), PTI #16-02157, issued 2/12/2002	See b)(2)a. through b)(2)p. and c)(1) through c)(12)
b.	OAC rule 3745-31-05(D) Synthetic Minor to Avoid Title V	See b)(2)q. and c)(1) through c)(8)
c.	OAC rule 3745-17-07(A)(1)	Visible particulate emissions (PE) from any stack serving this emissions unit shall not exceed 20% opacity, as a 6-minute average, except as provided by rule.
d.	OAC rule 3745-17-10(B)(1)	See b)(2)r.
e.	OAC rule 3745-17-11(C)	See b)(2)s.
f.	OAC rule 3745-21-09(B)(6)	See b)(2)t. and c)(1)
g.	OAC rule 3745-21-09(U)(1)	See b)(2)t. and c)(1)

(2) Additional Terms and Conditions

- a. The requirements of this rule also include compliance with the requirements of OAC rules 3745-17-07(A)(1), 3745-17-10(B)(1), 3745-21-09(B)(6), and 3745-21-09(U)(1).
- b. Volatile organic compound (VOC) emissions associated with painting operations from this emissions unit shall not exceed 2.38 pounds per hour and 10.4 tons per year.
- c. VOC emissions associated with the cleanup operations from this emissions unit shall not exceed 11.07 pounds per week and 0.29 ton per year.
- d. VOC emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.028 pound per hour and 0.12 ton per year.
- e. Nitrogen oxides (NO_x) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.50 pound per hour and 2.20 tons per year.
- f. Sulfur dioxide (SO₂) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.003 pound per hour and 0.01 ton per year.
- g. Particulate emissions (PE) associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.038 pound per hour and 0.17 ton per year.
- h. Carbon monoxide (CO) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.42 pound per hour and 1.84 tons per year.
- i. Formaldehyde emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.12 ton per year.
- j. Methanol emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.14 ton per year.
- k. Xylene emissions associated with painting operations from this emissions unit shall not exceed 0.26 pound per hour and 1.12 tons per year.
- l. Methyl Isobutyl ketone (MIBK) emissions associated with painting operations from this emissions unit shall not exceed 0.05 pound per hour and 0.20 ton per year.
- m. Ethyl benzene emissions associated with painting operations from this emissions unit shall not exceed 0.05 pound per hour and 0.23 ton per year.
- n. Naphthalene emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.12 ton per year.

- o. Toluene emissions associated with painting operations from this emissions unit shall not exceed 0.55 pound per hour and 2.41 tons per year.
- p. MEK emissions associated with painting operations from this emissions unit shall not exceed 0.95 pound per hour and 4.14 tons per year.
- q. Emissions unit K001 is part of the facility-wide, federally enforceable VOC and hazardous air pollutant (HAP) emissions limitations established for the purpose of avoiding Title V applicability under section B.1.c) of this permit.
- r. The emission limitation specified by this rule is less stringent than that established pursuant to OAC rule 3745-31-05(A)(3).
- s. Pursuant to OAC rule 3745-17-11(A)(1)(h), surface coating processes that apply only roll coatings are exempt from the requirements of this rule.
- t. In lieu of complying with the pounds of VOC per gallon of solids limitation contained in OAC rule 3745-21-09(U)(1), the permittee has chosen to employ a control device (regenerative thermal oxidizer) and will demonstrate that the capture and control efficiency provide not less than an eighty one percent reduction, by weight, in the overall VOC emissions from the coating line and that the control device has a destruction efficiency of not less than ninety percent, by weight, for the VOC emissions vented to the control device in accordance with OAC rule 3745-21-09(B)(6).

c) Operational Restrictions

- (1) When either emissions unit K001 or K008 or both are in operation, the permittee shall employ a regenerative thermal oxidizer (RTO) which shall provide not less than an eighty one per cent reduction, by weight, in the overall VOC emissions from the coating line and that the control equipment has an efficiency of not less than ninety per cent, by weight, for the VOC emissions vented to the control equipment.
- (2) The roll coating and paint line booths shall be totally enclosed, with 100% capture efficiency.
- (3) Paint usage for this emissions unit shall be limited to 200 gallons per day.
- (4) The VOC content of the coatings used in the painting operations shall be limited to 5.7 pounds per gallon.
- (5) The maximum amount of thinning is two parts coating to one part MEK.
- (6) The maximum density of the coatings that are thinned shall be 9.70 pounds per gallon, as applied.
- (7) The maximum density of the coatings that are not thinned shall be 7.80 pounds per gallon, as applied.
- (8) The maximum amount of MEK used as clean-up solvent shall be 55 gallons per week. The minimum recovery rate from off-site hazardous waste disposal shall be 40%.

- (9) All clean-up shall be conducted inside the booths with the RTO in operation.
 - (10) Natural gas fired dry-off ovens shall be used to cure the parts. The oven's exhaust gases shall be vented to the RTO.
 - (11) The permanent total enclosure shall be maintained under negative pressure, at a minimum pressure differential that is not less than 0.013 mm Hg (0.007 in. H₂O), whenever the emissions unit is in operation.
- d) Monitoring and/or Recordkeeping Requirements
- (1) In order to maintain compliance with the applicable emission limitation(s) contained in this permit, the acceptable average combustion temperature within the thermal incinerator, for any 3-hour block of time when the emissions unit(s) controlled by the thermal oxidizer is/are in operation, shall not be more than 50 degrees Fahrenheit below the average temperature measured during the most recent performance test that demonstrated the emissions unit(s) was/were in compliance.
 - (2) The permittee shall properly install, operate, and maintain a continuous temperature monitor and recorder that measures and records the combustion temperature within the thermal oxidizer when the emissions unit(s) is/are in operation, including periods of startup and shutdown. Units shall be in degrees Fahrenheit. The accuracy for each thermocouple, monitor, and recorder shall be guaranteed by the manufacturer to be within ± 1 percent of the temperature being measured or ± 5 degrees Fahrenheit, whichever is greater. The temperature monitor and recorder shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and the operating manuals, with any modifications deemed necessary by the permittee.
 - (3) The permittee shall collect and record the following information each day for the coating line and maintain the information at the facility for a period of three years:
 - a. The name and identification number of each coating used.
 - b. The mass of VOC per unit volume of coating solids, as applied, the volume solids content, as applied, and the volume, as applied, of each coating.
 - c. The maximum VOC content (mass of VOC per unit volume of coating solids, as applied) or the daily volume-weighted average VOC content (mass of VOC per unit volume of coating solids, as applied) of all the coatings.
 - d. The calculated, controlled VOC emission rate, in mass of VOC per unit volume of coating solids, as applied. The controlled VOC emission rate shall be calculated using (a) either the maximum VOC content or the daily volume-weighted VOC content recorded in accordance with paragraph (B)(3)(j)(iii) of this rule and (b) the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the source was in compliance.

- e. A log or record of operating time for the capture (collection) system, control device, monitoring equipment, and the associated coating line.
 - f. all three-hour periods of operation during which the average combustion temperature was more than fifty degrees Fahrenheit below the average combustion temperature during the most recent performance test that demonstrated that the source was in compliance.
- (4) The permittee shall collect and record the following information each month for this emissions unit:
- a. the name and identification number of each coating, as applied;
 - b. the VOC content of each coating, as applied, in pounds per gallon;
 - c. the individual HAP content of each coating, in pounds of individual HAP per gallon of coating, as applied;
 - d. the total combined HAP content of each coating, in pounds of combined HAP per gallon of coating, as applied [sum all the individual HAP contents from d)(2)c. above];
 - e. the number of gallons of each coating employed;
 - f. the name and identification of each cleanup material employed;
 - g. the number of gallons of each cleanup material employed;
 - h. the VOC content of each cleanup material, in pounds per gallon;
 - i. the individual HAP content of each cleanup material, in pounds of individual HAP per gallon of cleanup material, as applied;
 - j. the total combined HAP content of each cleanup material, in pounds of combined HAPs per gallon of cleanup material, as applied [sum all the individual HAP contents from d)(2)i. above];
 - k. the total uncontrolled VOC emissions from all coatings and cleanup materials employed, in pounds or tons;
 - l. the total individual HAP emissions from all coatings and cleanup materials employed, in pounds or tons per month [for each HAP the sum of d)(2)c. times d)(2)e. for each coating plus the sum of d)(2)i. times d)(2)g. for each cleanup material];
 - m. the total combined HAP emissions from all coatings and cleanup materials employed, in pounds or tons per month [the sum of d)(2)d. times d)(2)e. for each coating plus the sum of d)(2)j. times d)(2)g. for each cleanup material];

- n. the calculated, controlled VOC emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled VOC emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance;
 - o. the calculated, controlled individual HAP emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled individual HAP emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance; and
 - p. the calculated, controlled combined HAP emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled combined HAP emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance.
- (5) The permittee shall install, operate, and maintain monitoring devices and a recorder that continuously monitor and record the differential pressure between the inside and outside of the permanent total enclosure when the emissions unit is in operation. The monitoring and recording devices shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and operating manuals, with any modifications deemed necessary by the permittee.
- The permittee shall collect and record the following information each day:
- a. all three-hour blocks of time during which the difference in pressure between the permanent total enclosure and the surrounding areas is not maintained at or above the minimum pressure differential of 0.007 inches of water, as a three-hour average; and
 - b. a log or record of downtime for the capture (collection) system when the emissions unit was in operation.
- (6) The permittee shall measure, document/calculate, and maintain a permanent record of the following information for the permanent total enclosure, which may be the same record documented during the compliance test(s):
- a. the measured diameter of each natural draft opening;
 - b. the distance measured from each natural draft opening to each VOC emitting point;
 - c. the total calculated surface area of all natural draft openings and the surface area of the enclosure's four walls, floor, and ceiling;

- d. the calculation or demonstration that the distance from each VOC emitting point to each natural draft opening is at least 4 times the diameter of the opening; and
 - e. the calculation demonstrating that the sum of the surface areas of all of the natural draft openings to the enclosure is not more than 5 percent of the sum of the surface areas of the enclosure's four walls, floor, and ceiling.
- (7) The federally enforceable permit-to-install and operate (FEPTIO) application for emissions unit K001 was evaluated based on the actual materials and the design parameters of the emissions unit's exhaust system, 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 emitted at over one ton per year 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, (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. short term exposure limit (STEL) 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 then adjusted to account for the duration of the exposure or the operating hours of the emissions unit, 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 (emitted at 1 or more tons/year) or “worst-case” toxic contaminant:

Pollutant: Formaldehyde
TLV (mg/m3): 0.37
Maximum Hourly Emission Rate (lbs/hr): 0.03
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 0.75
MAGLC (ug/m3): 8.77

The permittee, has demonstrated that emissions of formaldehyde, from emissions unit K001 is calculated to be less than eighty percent 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).

- (8) Prior to making any physical changes to or changes in the method of operation of the emissions unit, 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 changes 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 or its 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 changes 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 changes meet the definition of a “modification”, the permittee shall apply for and obtain a final FEPTIO prior to the change. The Director (appropriate Ohio EPA District Office or Local Air Agency) 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.

(9) 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. 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 or the materials applied.

(10) 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 summaries of the following records:

- a. all 3-hour blocks of time (when the emissions unit(s) was/were in operation) during which the average combustion temperature within the thermal oxidizer was more than 50 degrees Fahrenheit below the average temperature maintained during the most recent performance test that demonstrated the emissions unit(s) was/were in compliance;
- b. any records of downtime (date and length of time) for the capture (collection) system, the thermal oxidizer, and/or the monitoring equipment when the emissions unit(s) was/were in operation; and

- c. a log of the operating time for the capture system, thermal oxidizer, monitoring equipment, and the emissions unit(s).

These quarterly reports shall be submitted by April 30, July 31, October 31, and January 31, and shall cover the records for the previous calendar quarters.

- (2) The permittee shall submit quarterly deviation (excursion) reports that identify:
 - a. all deviations (excursions) of the operational restrictions and/or control requirements that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit;
 - b. the probable cause of each deviation (excursion);
 - c. any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
 - d. the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- (3) The permittee shall submit an annual Permit Evaluation Report (PER) to the Ohio EPA. The PER must be completed electronically and submitted via the Ohio EPA eBusiness Center: Air Services 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.

The permittee shall include the following information in the annual PER:

- a. a log of operating time for the capture (collection) system, control device, monitoring equipment, and the associated emissions unit;
- b. all 3-hour blocks of time during which the average combustion temperature within the thermal incinerator was more than 50°F below the average temperature specified in c)(11);
- c. all three-hour blocks of time, when the emissions unit was in operation, during which the permanent total enclosure was not maintained at the minimum pressure differential of 0.007 inches of water; and
- d. any changes made to a parameter or value used in the dispersion model, that was used to maintain compliance with the "Toxic Air Contaminant Statute", ORC 3704.03(F), through the predicted 1-hour maximum ground-level concentration.

f) Testing Requirements

(1) Compliance with the Emissions Limitations and/or Control Requirements specified in section b) of these terms and conditions shall be determined in accordance with the following methods:

a. Emissions Limitations:

VOC emissions associated with painting operations shall not exceed 2.38 pounds per hour and 10.4 tons per year

Applicable Compliance Methods:

Compliance with the hourly VOC emissions limitation identified above shall be demonstrated by multiplying the maximum allowable painting rate of 200 gallons per day by the maximum VOC content of the coatings (5.7 pounds of VOC per gallon), and a conversion factor of 1 day per 24 hours. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

b. Emissions Limitations:

VOC emissions associated with clean-up operations shall not exceed 11.07 pounds per week and 0.29 ton per year

Applicable Compliance Methods:

Compliance with the weekly VOC emissions limitation identified above shall be demonstrated by multiplying the maximum MEK usage rate for clean-up operations of 55 gallons per week by the emission factor of 6.71 pounds per gallon. This weekly emission rate is reduced by a recovery rate of forty percent (multiplied by a factor of 1 - 0.40), which is the weekly amount of MEK emitted prior to control. This emission rate is further reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per week limitation by 52 weeks per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the weekly emissions limitation.

c. Emissions Limitations:

VOC emissions associated with natural gas combustion shall not exceed 0.028 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emissions factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly VOC emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 5.5 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

d. Emissions Limitations:

NO_x emissions associated with natural gas combustion shall not exceed 0.50 pound per hour and 2.20 tons per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly NO_x emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 100 pounds of NO_x emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

e. Emissions Limitations:

SO₂ emissions associated with natural gas combustion shall not exceed 0.003 pound per hour and 0.01 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly SO₂ emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 0.6 pound of SO₂ emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

f. Emissions Limitations:

PE associated with natural gas combustion shall not exceed 0.038 pound per hour and 0.17 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly PE limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 7.6 pounds of total particulates emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

g. Emissions Limitations:

CO emissions associated with natural gas combustion shall not exceed 0.42 pound per hour and 1.84 tons per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less

than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly CO emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 84 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

h. Emissions Limitations:

Formaldehyde emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Compliance with the hourly formaldehyde emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.7% formaldehyde), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

i. Emissions Limitations:

Methanol emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.14 ton per year

Applicable Compliance Methods:

Compliance with the hourly methanol emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.8% methanol), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

j. Emissions Limitations:

Xylene emissions associated with painting operations shall not exceed 0.26 pound per hour and 1.12 tons per year

Applicable Compliance Methods:

Compliance with the hourly xylene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (7.9% xylene), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

k. Emissions Limitations:

MIBK emissions associated with painting operations shall not exceed 0.05 pound per hour and 0.20 ton per year

Applicable Compliance Methods:

Compliance with the hourly MIBK emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (1.4% MIBK), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

I. Emissions Limitations:

Ethyl benzene emissions associated with painting operations shall not exceed 0.05 pound per hour and 0.23 ton per year

Applicable Compliance Methods:

Compliance with the hourly ethyl benzene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (1.6% ethyl benzene), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

m. Emissions Limitations:

Naphthalene emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Compliance with the hourly naphthalene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.7% naphthalene), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

n. Emissions Limitations:

Toluene emissions associated with painting operations shall not exceed 0.55 pound per hour and 2.41 tons per year

Applicable Compliance Methods:

Compliance with the hourly toluene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight (17.0%

toluene), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

o. Emissions Limitations:

MEK emissions associated with painting operations shall not exceed 0.95 pound per hour and 4.14 tons per year

Applicable Compliance Methods:

Compliance with the hourly MEK emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (23.5% MEK), by the maximum allowable paint usage rate of 8.3 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

p. Emissions Limitation:

PE shall not exceed 20% opacity, as a 6-minute average.

Applicable Compliance Methods:

Compliance with the opacity limitation identified above shall be demonstrated in accordance with the test methods and procedures specified in OAC rule 3745-17-03(B)(1).

- (2) The permittee shall conduct, or have conducted, emissions testing for this emissions unit in accordance with the following requirements:
- a. Emissions testing shall be conducted prior to July 29, 2012 and within 6 months prior to the permit expiration.
 - b. The emissions testing shall be conducted to demonstrate compliance with the following capture efficiency and control efficiency limitations for VOC:

When either emissions unit K001 or K008 or both are in operation, the permittee shall employ a regenerative thermal oxidizer which shall provide not less than an eighty one per cent reduction, by weight, in the overall VOC emissions from the coating line and that the control equipment has an efficiency of not less than ninety per cent, by weight, for the VOC emissions vented to the control equipment.

- c. The following test method(s) shall be employed to demonstrate compliance with the allowable mass emission rate(s): for VOC, Method 25 or 25A (whichever is appropriate) of 40 CFR Part 60, Appendix A. The test method(s) which must be employed to demonstrate compliance with the capture efficiency and control efficiency limitations for VOC are specified below. Alternative U.S. EPA approved test methods may be used with prior approval from the Ohio EPA.

The capture efficiency shall be determined using Methods 204 through 204F, as specified in 40 CFR Part 51, Appendix M, or the permittee may request to use an alternative method or procedure for the determination of capture efficiency in accordance with the USEPA's "Guidelines for Determining Capture Efficiency," dated January 9, 1995. (The Ohio EPA will consider the request, including an evaluation of the applicability, necessity, and validity of the alternative, and may approve the use of the alternative if such approval does not contravene any other applicable requirement.)

The control efficiency (i.e., the percent reduction in mass emissions between the inlet and outlet of the control system) shall be determined in accordance with the test methods and procedures specified in OAC rule 3745-21-10 or an alternative test protocol approved by the Ohio EPA. The test methods and procedures selected shall be based on a consideration of the diversity of the organic species present and their total concentration, and on a consideration of the potential presence of interfering gases.

- d. The test(s) shall be conducted under those representative conditions that challenge to the fullest extent possible a facility's ability to meet the applicable emissions limits and/or control requirements, unless otherwise specified or approved by the appropriate Ohio EPA District Office or Local Air Agency. Although this generally consists of operating the emissions unit at its maximum material input/production rates and results in the highest emission rate of the tested pollutant, there may be circumstances where a lower emissions loading is deemed the most challenging control scenario. Failure to test under these conditions is justification for not accepting the test results as a demonstration of compliance.
- e. Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the appropriate Ohio EPA District Office or Local Air Agency. The "Intent to Test" notification shall describe in detail the proposed test methods and procedures, the emissions unit operating parameters, the time(s) and date(s) of the test(s), and the person(s) who will be conducting the test(s). Failure to submit such notification for review and approval prior to the test(s) may result in the Ohio EPA District Office's or Local Air Agency's refusal to accept the results of the emission test(s).

- f. Personnel from the appropriate Ohio EPA District Office or Local Air Agency shall be permitted to witness the test(s), examine the testing equipment, and acquire data and information necessary to ensure that the operation of the emissions unit and the testing procedures provide a valid characterization of the emissions from the emissions unit and/or the performance of the control equipment.
- g. A comprehensive written report on the results of the emissions test(s) shall be signed by the person or persons responsible for the tests and submitted to the appropriate Ohio EPA District Office or Local Air Agency within 30 days following completion of the test(s). The permittee may request additional time for the submittal of the written report, where warranted, with prior approval from the appropriate Ohio EPA District Office or Local Air Agency.

g) Miscellaneous Requirements

- (1) None.

2. Emissions Unit Group - Hand Cover Lines: K003, K004

EU ID	Operations, Property and/or Equipment Description
K003	UN Hand Cover Line; Blanking and forming covers from steel sheet and applying gasket material to pails. 3 MMBtu/hroven shared with emissions unit K004.
K004	Standard Hand Cover Line; Blanking and forming covers from steel sheet and applying gasket material to pails. 3 MMBtu/hroven shared with emissions unit K003.

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. None.

(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. b)(1)b.

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), PTI #16-02157, issued 2/12/2002	Zero pounds of VOC per gallon of coating, excluding water and exempt solvents. See b)(2)a. through b)(2)i., c)(1) and c)(2)
b.	OAC rule 3745-31-05(D) Synthetic Minor to Avoid Title V	See b)(2)j. and c)(2)
c.	OAC rule 3745-17-07(A)(1)	See b)(2)k.
d.	OAC rule 3745-17-10(B)(1)	See b)(2)k.
e.	OAC rule 3745-17-11(B)(1)	See b)(2)h.
f.	OAC rule 3745-21-09(U)(1)	See b)(2)k.

- (2) Additional Terms and Conditions
- a. The requirements of this rule also include compliance with OAC rules 3745-17-07(A)(1), 3745-17-10(B)(1), 3745-17-11(B)(1), and 3745-21-09(U)(1).
 - b. Volatile organic compound (VOC) emissions associated with the use of mineral spirits shall not exceed 4.19 pounds per hour and 18.34 tons per year from emissions units K003 and K004, individually.
 - c. Nitrogen oxides (NO_x) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.30 pound per hour and 0.66 ton per year from emissions units K003 and K004, individually.
 - d. Sulfur dioxide (SO₂) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.002 pound per hour and 0.005 ton per year from emissions units K003 and K004, individually.
 - e. Particulate emissions (PE) associated with natural gas combustion from the dry-off oven shall not exceed 0.023 pound per hour and 0.05 ton per year from emissions units K003 and K004, individually.
 - f. Carbon monoxide (CO) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.25 pound per hour and 0.55 ton per year from emissions units K003 and K004, individually.
 - g. Ammonia emissions shall not exceed 0.73 pound per hour and 3.2 tons per year from emissions unit K003 and K004, individually.
 - h. PE associated with blanking and forming covers shall not exceed 0.551 pound per hour and 2.41 tons per year from emissions units K003 and K004, individually.
 - i. Visible PE from any stack shall not exceed 5% opacity, as a 6-minute average.
 - j. Emissions units K003 and K004 are part of the facility-wide, federally enforceable VOC emission limitation established for the purpose of avoiding Title V applicability under section B.1.c) of this permit. No hazardous air pollutants (HAP) are emitted from these emissions units.
 - k. The emission limitation specified by this rule is less stringent than the emission limitation established pursuant to OAC rule 3745-31-05(A)(3).
 - l. The hourly and annual allowable ammonia emission limitations are based on the emissions units' potential to emit. Therefore, no additional monitoring, record keeping, and reporting requirements are necessary to ensure ongoing compliance with these emissions limitations.

c) Operational Restrictions

- (1) Natural gas shall be the only fuel used to fire the curing oven for these emissions units.
- (2) The processing of cold rolled steel shall be limited to 2,250 pounds per hour.

d) Monitoring and/or Recordkeeping Requirements

- (1) The permittee shall maintain daily records of the quantity of mineral spirits used, in gallons, for each emissions unit.
- (2) The permittee shall collect and record the following information each month for these emissions units:
 - a. the name and identification number of each coating employed;
 - b. the VOC content of each coating, in pounds per gallon, as applied; and
 - c. the quantity of each coating used, in gallons.
- (3) The federally enforceable permit-to-install and operate (FEPTIO) application for emissions units, K003 and K004, was evaluated based on the actual materials and the design parameters of the emissions unit's exhaust system, 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 emitted at over one ton per year 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, (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. short term exposure limit (STEL) 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 then adjusted to account for the duration of the exposure or the operating hours of the emissions unit, 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):

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

- 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:

Pollutant: Ammonia
TLV (mg/m3): 17.0
Maximum Hourly Emission Rate (lbs/hr): 0.73
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 104.1
MAGLC (ug/m3): 404.76

The permittee, has demonstrated that emissions of formaldehyde from these emissions units is calculated to be less than eighty percent 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).

- (4) Prior to making any physical changes to or changes in the method of operation of the emissions unit, 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 changes 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 or its 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 changes 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 changes meet the definition of a “modification”, the permittee shall apply for and obtain a final FEPTIO prior to the change. The Director (appropriate Ohio EPA District Office or Local Air Agency) 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.

- (5) 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. 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 or the materials applied.
- (6) 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:
 - a. all deviations (excursions) of the operational restrictions and/or control device operating parameter limitations that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit;
 - b. the probable cause of each deviation (excursion);

- c. any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
- d. the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- (2) The permittee shall submit an annual Permit Evaluation Report (PER) to the Ohio EPA. The PER must be completed electronically and submitted via the Ohio EPA eBusiness Center: Air Services 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.

The permittee shall include in the annual PER any changes made to a parameter or value used in the dispersion model, that was used to maintain compliance with the "Toxic Air Contaminant Statute", ORC 3704.03(F), through the predicted 1-hour maximum ground-level concentration.

f) Testing Requirements

- (1) Compliance with the Emissions Limitations and/or Control Requirements specified in section b) of these terms and conditions shall be determined in accordance with the following methods:

- a. Emission Limitations:

Zero pounds of VOC per gallon of coating, excluding water and exempt solvents

Applicable Compliance Methods:

Compliance with the coating VOC content limitation identified above shall be demonstrated by the record keeping requirements specified in d)(2).

- b. Emission Limitations:

VOC emissions associated with the use of mineral spirits shall not exceed:

4.19 pounds per hour and 18.34 tons per year, from emissions unit K003

4.19 pounds per hour and 18.34 tons per year, from emissions unit K004

Applicable Compliance Methods:

Compliance with the hourly VOC emissions limitations identified above shall be demonstrated by multiplying the maximum production rate of 2,250 pounds per

hour by the conversion factor of 1 gallon of mineral spirits used per 3,600 pounds of production and the emission factor of 6.7 pounds of VOC per gallon of mineral spirits.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

c. Emission Limitations:

NO_x emissions associated with natural gas combustion shall not exceed:
0.30 pound per hour and 0.66 ton per year from emissions unit K003
0.30 pound per hour and 0.66 ton per year from emissions unit K004

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly NO_x emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 100 pounds of NO_x emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. This amount is divided in half to obtain the allowable annual emission rate for emissions units K003 and K004, since these units share an oven. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

d. Emission Limitations:

SO₂ emissions associated with natural gas combustion shall not exceed:
0.002 pound per hour and 0.005 ton per year from emissions unit K003
0.002 pound per hour and 0.005 ton per year from emissions unit K004

Applicable Compliance Method:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly SO₂ emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 0.6 pounds of SO₂ emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. This amount is divided in half to obtain the allowable annual emission rate for emissions units K003 and K004, since these units share an oven. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

e. Emission Limitations:

PE associated with natural gas combustion shall not exceed:

0.023 pound per hour and 0.05 ton per year from emissions unit K003

0.023 pound per hour and 0.05 ton per year from emissions unit K004

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly PE limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 7.6 pounds of total particulates emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. This amount is divided in half to obtain the allowable annual emission rate for emissions units K003 and K004, since these units share an oven. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

f. Emission Limitations:

CO emissions associated with natural gas combustion shall not exceed:

0.25 pound per hour and 0.55 ton per year from emissions unit K003

0.25 pound per hour and 0.55 ton per year from emissions unit K004

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly CO emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 84 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. This amount is divided in half to obtain the allowable annual emission rate for emissions units K003 and K004, since these units share an oven. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

g. Emission Limitations:

Ammonia emissions shall not exceed:

0.73 pound per hour and 3.2 tons per year from emissions unit K003

0.73 pound per hour and 3.2 tons per year from emissions unit K004

Applicable Compliance Methods:

Compliance with the hourly ammonia emission limitations identified above shall be demonstrated by multiplying the maximum production rate of 145 pounds of coating per hour by the emission factor of 0.005 pound of VOC emitted per pound of coating (formulation data).

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

h. Emission Limitations:

PE associated with blanking and forming covers shall not exceed:

0.551 pound per hour and 2.41 tons per year from emissions unit K003

0.551 pound per hour and 2.41 tons per year from emissions unit K004

Applicable Compliance Method:

If required, compliance with the hourly PE limitation identified above shall be determined through stack testing conducted in accordance with the test methods and procedures specified in OAC rule 3745-17-03(B)(10).

i. Emission Limitations:

PE shall not exceed 5% opacity, as a 6-minute average.

Applicable Compliance Method:

Compliance with the opacity limitation identified above shall be demonstrated in accordance with the test methods and procedures specified in OAC rule 3745-17-03(B)(1).

g) Miscellaneous Requirements

(1) None.

3. Emissions Unit Group - Auto Cover Lines: K005, K006

EU ID	Operations, Property and/or Equipment Description
K005	UN Auto Cover Line; Blanking and forming covers from steel sheet and applying gasket material to pails, and 3 MMBtu/hr oven.
K006	Standard Auto Cover Line; Blanking and forming covers from steel sheet and applying gasket material to pails, and 3 MMBtu/hr oven.

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. None.

(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. b)(1)b.

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), PTI #16-02157, issued 2/12/2002	Zero pounds of VOC per gallon of coating, excluding water and exempt solvents. See b)(2)a. through b)(2)g., c)(1) and c)(2)
b.	OAC rule 3745-31-05(D) Synthetic Minor to Avoid Title V	See b)(2)h. and c)(2)
c.	OAC rule 3745-17-07(A)(1)	Visible PE from any stack serving this emissions unit shall not exceed 20% opacity as a 6-minute average, except as provided by rule.
d.	OAC rule 3745-17-10(B)(1)	See b)(2)i.
f.	OAC rule 3745-21-09(U)(1)	See b)(2)i.

(2) Additional Terms and Conditions

- a. The requirements of this rule also include compliance with OAC rules 3745-17-07(A)(1), 3745-17-10(B)(1), and 3745-21-09(U)(1).
- b. Volatile organic compound (VOC) emissions associated with the use of mineral spirits shall not exceed 1.67 pounds per hour and 7.33 tons per year from emissions units K005 and K006, individually.
- c. Nitrogen oxides (NO_x) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.30 pound per hour and 1.31 tons per year from emissions units K005 and K006, individually.
- d. Sulfur dioxide (SO₂) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.002 pound per hour and 0.01 ton per year from emissions units K005 and K006, individually.
- e. Particulate emissions (PE) associated with natural gas combustion from the dry-off oven shall not exceed 0.023 pound per hour and 0.10 ton per year from emissions units K005 and K006, individually.
- f. Carbon monoxide (CO) emissions associated with natural gas combustion from the dry-off oven shall not exceed 0.25 pound per hour and 1.10 tons per year from emissions units K005 and K006, individually.
- g. Ammonia emissions shall not exceed 0.73 pound per hour and 3.2 tons per year from emissions unit K005 and K006, individually.
- h. Emissions units K005 and K006 are part of the facility-wide, federally enforceable VOC emission limitation established for the purpose of avoiding Title V applicability under section B.1.c) of this permit. No hazardous air pollutants (HAP) are emitted from these emissions units.
- i. The emission limitation specified by this rule is less stringent than the emission limitation established pursuant to OAC rule 3745-31-05(A)(3).
- j. The hourly and annual allowable ammonia emission limitations are based on the emissions units' potential to emit. Therefore, no additional monitoring, record keeping, and reporting requirements are necessary to ensure ongoing compliance with these emission limitations.

c) Operational Restrictions

- (1) Natural gas shall be the only fuel used to fire the curing oven for these emissions units.
- (2) The processing of cold rolled steel shall be limited to 4,500 pounds per hour.

d) Monitoring and/or Recordkeeping Requirements

- (1) The permittee shall maintain daily records of the quantity of mineral spirits used, in gallons, for each emissions unit.
- (2) The permittee shall collect and record the following information each month for these emissions units:
 - a. the name and identification number of each coating employed;
 - b. the VOC content of each coating, in pounds per gallon, as applied; and
 - c. the quantity of each coating used, in gallons.
- (3) The federally enforceable permit-to-install and operate (FEPTIO) application for emissions units, K005 and K006, was evaluated based on the actual materials and the design parameters of the emissions unit's exhaust system, 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 emitted at over one ton per year 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, (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. short term exposure limit (STEL) 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 then adjusted to account for the duration of the exposure or the operating hours of the emissions unit, 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 (emitted at 1 or more tons/year) or "worst-case" toxic contaminant:

Pollutant: Ammonia
TLV (mg/m3): 17.0
Maximum Hourly Emission Rate (lbs/hr): 0.73
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 104.1
MAGLC (ug/m3): 404.76

The permittee, has demonstrated that emissions of formaldehyde from these emissions units is calculated to be less than eighty percent 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).

- (4) Prior to making any physical changes to or changes in the method of operation of the emissions unit, 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 changes 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 or its 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 changes 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 changes meet the definition of a "modification", the permittee shall apply for and obtain a final FEPTIO prior to the change. The Director (appropriate Ohio EPA District Office or Local Air Agency) 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.

- (5) 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. 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 or the materials applied.
- (6) 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:
- a. all deviations (excursions) of the operational restrictions and/or control device operating parameter limitations that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit;
 - b. the probable cause of each deviation (excursion);
 - c. any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
 - d. the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- (2) The permittee shall submit an annual Permit Evaluation Report (PER) to the Ohio EPA. The PER must be completed electronically and submitted via the Ohio EPA eBusiness Center: Air Services 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.

The permittee shall include in the annual PER any changes made to a parameter or value used in the dispersion model, that was used to maintain compliance with the "Toxic Air Contaminant Statute", ORC 3704.03(F), through the predicted 1-hour maximum ground-level concentration.

f) Testing Requirements

- (1) Compliance with the Emissions Limitations and/or Control Requirements specified in section b) of these terms and conditions shall be determined in accordance with the following methods:

a. Emission Limitations:

Zero pounds of VOC per gallon of coating, excluding water and exempt solvents

Applicable Compliance Methods:

Compliance with the coating VOC content limitation identified above shall be demonstrated by the recordkeeping requirements specified in d)(2).

b. Emission Limitations:

VOC emissions associated with the use of mineral spirits shall not exceed:

1.67 pounds per hour and 7.33 tons per year from emissions unit K005

1.67 pounds per hour and 7.33 tons per year from emissions unit K006

Applicable Compliance Methods:

Compliance with the hourly VOC emissions limitations identified above shall be demonstrated by multiplying the maximum production rate of 4,500 pounds per hour by the conversion factor of 1 gallon of mineral spirits used per 18,000 pounds of production and the emission factor of 6.7 pounds of VOC per gallon of mineral spirits.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

c. Emission Limitations:

NO_x emissions associated with natural gas combustion shall not exceed:
0.30 pound per hour and 1.31 tons per year from emissions unit K005
0.30 pound per hour and 1.31 tons per year from emissions unit K006

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly NO_x emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 100 pounds of NO_x emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

d. Emission Limitations:

SO₂ emissions associated with natural gas combustion shall not exceed:
0.002 pound per hour and 0.01 ton per year from emissions unit K005
0.002 pound per hour and 0.01 ton per year from emissions unit K006

Applicable Compliance Method:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly SO₂ emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 0.6 pounds of SO₂ emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

e. Emission Limitations:

PE associated with natural gas combustion shall not exceed:
0.023 pound per hour and 0.10 ton per year from emissions unit K005
0.023 pound per hour and 0.10 ton per year from emissions unit K006

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly PE limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 7.6 pounds of total particulates emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

f. Emission Limitations:

CO emissions associated with natural gas combustion shall not exceed:
0.25 pound per hour and 1.10 tons per year from emissions unit K005
0.25 pound per hour and 1.10 tons per year from emissions unit K006

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly CO emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 84 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

g. Emission Limitations:

Ammonia emissions shall not exceed:

0.73 pound per hour and 3.2 tons per year from emissions unit K005

0.73 pound per hour and 3.2 tons per year from emissions unit K006

Applicable Compliance Methods:

Compliance with the hourly ammonia emission limitations identified above shall be demonstrated by multiplying the maximum production rate of 145 pounds of coating per hour by the emission factor of 0.005 pound of VOC emitted per pound of coating (formulation data).

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

h. Emission Limitations:

PE shall not exceed 20% opacity, as a 6-minute average

Applicable Compliance Method:

Compliance with the opacity limitation identified above shall be demonstrated in accordance with the test methods and procedures specified in OAC rule 3745-17-03(B)(1).

g) Miscellaneous Requirements

- (1) None.

4. Emissions Unit ID: K007, Cover Line

Operations, Property and/or Equipment Description:

Hand Line Bottoms (two presses). Blanking and forming covers from sheet steel and applying gasket material to pails, and 3 MMBtu/hroven.

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. None.

(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. b)(1)b.

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), PTI #16-02157, issued 2/12/2002	Zero pounds of VOC per gallon of coating, excluding water and exempt solvents. See b)(2)a. through b)(2)e. and c)(1)
b.	OAC rule 3745-31-05(D) Synthetic Minor to Avoid Title V	See b)(2)f.
c.	OAC rule 3745-17-10(B)(1)	See b)(2)g.
d.	OAC rule 3745-21-09(U)(1)	See b)(2)g.

(2) Additional Terms and Conditions

a. The requirements of this rule also include compliance with OAC rules 3745-17-10(B)(1) and 3745-21-09(U)(1).

- b. Nitrogen oxides (NO_x) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.30 pound per hour and 1.31 tons per year.
 - c. Sulfur dioxide (SO₂) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.002 pound per hour and 0.01 ton per year.
 - d. Particulate emissions (PE) associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.023 pound per hour and 0.10 ton per year.
 - e. Carbon monoxide (CO) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.25 pound per hour and 1.10 tons per year.
 - f. Emissions unit K007 is part of the facility-wide, federally enforceable VOC emission limitation established for the purpose of avoiding Title V applicability under section B.1.c) of this permit. No hazardous air pollutants (HAP) are emitted from this emissions unit.
 - g. The emission limitation specified by this rule is less stringent than the emission limitation established pursuant to OAC rule 3745-31-05(A)(3).
- c) Operational Restrictions
- (1) Natural gas shall be the only fuel used to fire the curing oven for this emissions unit.
- d) Monitoring and/or Recordkeeping Requirements
- (1) The permittee shall maintain daily records of the following information for this emissions unit:
 - a. the name and identification number of each coating employed;
 - b. the VOC content of each coating, in pounds per gallon, as applied; and
 - c. the quantity of each coating used, in gallons.
- e) Reporting Requirements
- (1) The permittee shall submit quarterly deviation (excursion) reports that identify:
 - a. all deviations (excursions) of the operational restrictions and/or control device operating parameter limitations that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit;
 - b. the probable cause of each deviation (excursion);

- c. any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
- d. the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- (2) The permittee shall submit an annual Permit Evaluation Report (PER) to the Ohio EPA. The PER must be completed electronically and submitted via the Ohio EPA eBusiness Center: Air Services 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.

f) Testing Requirements

- (1) Compliance with the Emissions Limitations and/or Control Requirements specified in section b) of these terms and conditions shall be determined in accordance with the following methods:

- a. Emission Limitations:

Zero pounds of VOC per gallon of coating, excluding water and exempt solvents

Applicable Compliance Methods:

Compliance with the coating VOC content limitation identified above shall be demonstrated by the recordkeeping requirements specified in d)(1).

- b. Emission Limitations:

NO_x emissions associated with natural gas combustion shall not exceed 0.30 pound per hour and 1.31 tons per year from emissions unit K007.

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly NO_x emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 100 pounds of NO_x emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

c. Emission Limitations:

SO₂ emissions associated with natural gas combustion shall not exceed 0.002 pound per hour and 0.01 ton per year from emissions unit K007.

Applicable Compliance Method:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly SO₂ emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 0.6 pounds of SO₂ emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

d. Emission Limitations:

PE associated with natural gas combustion shall not exceed 0.023 pound per hour and 0.10 ton per year from emissions unit K007.

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly PE limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 BTU by the emission factor of 7.6 pounds of total particulates emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance

with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

e. Emission Limitations:

CO emissions associated with natural gas combustion shall not exceed 0.25 pound per hour and 1.10 tons per year from emissions unit K007.

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly CO emission limitations identified above shall be demonstrated by multiplying the emission factor of 3.0 MMBtu per hour by the number of cubic feet per 1,000 Btu by the emission factor of 84 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitations were established by multiplying the pound per hour limitations by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitations shall be demonstrated provided compliance is maintained with the hourly emissions limitations.

g) Miscellaneous Requirements

- (1) None.

5. K008, Spray Lining Paint Line

Operations, Property and/or Equipment Description:

Spray painting line used to coat the interior and exterior of covers for 5-gallon steel pails. Includes 5 MMBtu/hr dry-off oven. Emissions are vented to a regenerative thermal oxidizer control device shared with emissions unit K001.

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. None.

(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. b)(1)b.

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), PTI #16-02157, issued 2/12/2002	See b)(2)a. through b)(2)p. and c)(1) through c)(12)
b.	OAC rule 3745-31-05(D) Synthetic Minor to Avoid Title V	See b)(2)q. and c)(1) through c)(8)
c.	OAC rule 3745-17-07(A)(1)	Visible particulate emissions (PE) from any stack serving this emissions unit shall not exceed 20% opacity, as a 6-minute average, except as provided by rule.
d.	OAC rule 3745-17-10(B)(1)	See b)(2)r.
e.	OAC rule 3745-17-11(C)	See c)(13) and c)(14)
f.	OAC rule 3745-21-09(B)(6)	See b)(2)s. and c)(1)
g.	OAC rule 3745-21-09(U)(1)	See b)(2)s. and c)(1)

(2) Additional Terms and Conditions

- a. The requirements of this rule also include compliance with the requirements of OAC rules 3745-17-07(A)(1), 3745-17-10(B)(1), 3745-21-09(B)(6), and 3745-21-09(U)(1).
- b. Volatile organic compound (VOC) emissions associated with painting operations from this emissions unit shall not exceed 2.28 pounds per hour and 10.0 tons per year.
- c. VOC emissions associated with the clean-up operations from this emissions unit shall not exceed 11.07 pounds per week and 0.29 ton per year.
- d. VOC emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.028 pound per hour and 0.12 ton per year.
- e. Nitrogen oxides (NO_x) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.50 pound per hour and 2.20 tons per year.
- f. Sulfur dioxide (SO₂) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.003 pound per hour and 0.01 ton per year.
- g. Particulate emissions (PE) associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.038 pound per hour and 0.17 ton per year.
- h. Carbon monoxide (CO) emissions associated with natural gas combustion from the dry-off oven for this emissions unit shall not exceed 0.42 pound per hour and 1.84 tons per year.
- i. Formaldehyde emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.12 ton per year.
- j. Methanol emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.14 ton per year.
- k. Xylene emissions associated with painting operations from this emissions unit shall not exceed 0.25 pound per hour and 1.08 tons per year.
- l. Methyl Isobutyl ketone (MIBK) emissions associated with painting operations shall not exceed 0.05 pound per hour and 0.20 ton per year from emissions unit K001, and 0.04 pound per hour and 0.19 ton per year from emissions unit K008.
- m. Ethyl benzene emissions associated with painting operations from this emissions unit shall not exceed 0.05 pound per hour and 0.22 ton per year.
- n. Naphthalene emissions associated with painting operations from this emissions unit shall not exceed 0.03 pound per hour and 0.12 ton per year.

- o. Toluene emissions associated with painting operations from this emissions unit shall not exceed 0.53 pound per hour and 2.32 tons per year.
- p. MEK emissions associated with painting operations from this emissions unit shall not exceed 0.91 pound per hour and 4.00 tons per year.
- q. Emissions unit K008 is part of the facility-wide, federally enforceable VOC and hazardous air pollutant (HAP) emissions limitations established for the purpose of avoiding Title V applicability under section B.1.c) of this permit.
- r. The emission limitation specified by this rule is less stringent than that established pursuant to OAC rule 3745-31-05(A)(3).
- s. In lieu of complying with the pounds of VOC per gallon of solids limitation contained in OAC rule 3745-21-09(U)(1), the permittee has chosen to employ a control device (regenerative thermal oxidizer) and will demonstrate that the capture and control efficiency provide not less than an eighty one percent reduction, by weight, in the overall VOC emissions from the coating line and that the control device has a destruction efficiency of not less than ninety percent, by weight, for the VOC emissions vented to the control device in accordance with OAC rule 3745-21-09(B)(6).

c) Operational Restrictions

- (1) When either emissions unit K001 or K008 or both are in operation, the permittee shall employ a regenerative thermal oxidizer (RTO) which shall provide not less than an eighty one per cent reduction, by weight, in the overall VOC emissions from the coating line and that the control equipment has an efficiency of not less than ninety per cent, by weight, for the VOC emissions vented to the control equipment.
- (2) The roll coating and paint line booths shall be totally enclosed, with 100% capture efficiency.
- (3) Production on this emissions unit shall be limited to 80 steel covers per minute, with one gallon coating approximately 600 covers.
- (4) The VOC content of the coatings used in the painting operations shall be limited to 5.7 pounds per gallon.
- (5) The maximum amount of thinning is two parts coating to one part MEK.
- (6) The maximum density of the coatings that are thinned shall be 9.70 pounds per gallon, as applied.
- (7) The maximum density of the coatings that are not thinned shall be 7.80 pounds per gallon, as applied.
- (8) The maximum amount of MEK used as clean-up solvent shall be 55 gallons per week. The minimum recovery rate from off-site hazardous waste disposal shall be 40%.
- (9) All clean-up shall be conducted inside the booths with the RTO in operation.

- (10) Natural gas fired dry-off ovens shall be used to cure the parts. The oven's exhaust gases shall be vented to the RTO.
 - (11) The permanent total enclosure shall be maintained under negative pressure, at a minimum pressure differential that is not less than 0.013 mm Hg (0.007 in. H₂O), whenever the emissions unit is in operation.
 - (12) The permittee shall operate the dry filtration system for the control of particulate emissions whenever this emissions unit is in operation and shall maintain the dry particulate filter in accordance with the manufacturer's recommendations, instructions, and/or operating manual(s), with any modifications deemed necessary by the permittee.
 - (13) In the event the particulate filter system is not operating in accordance with the manufacturer's recommendations, instructions, or operating manual, with any modifications deemed necessary by the permittee, the control device shall be expeditiously repaired or otherwise returned to these documented operating conditions.
- d) Monitoring and/or Recordkeeping Requirements
- (1) In order to maintain compliance with the applicable emission limitation(s) contained in this permit, the acceptable average combustion temperature within the thermal incinerator, for any 3-hour block of time when the emissions unit(s) controlled by the thermal oxidizer is/are in operation, shall not be more than 50 degrees Fahrenheit below the average temperature measured during the most recent performance test that demonstrated the emissions unit(s) was/were in compliance.
 - (2) The permittee shall properly install, operate, and maintain a continuous temperature monitor and recorder that measures and records the combustion temperature within the thermal oxidizer when the emissions unit(s) is/are in operation, including periods of startup and shutdown. Units shall be in degrees Fahrenheit. The accuracy for each thermocouple, monitor, and recorder shall be guaranteed by the manufacturer to be within ± 1 percent of the temperature being measured or ± 5 degrees Fahrenheit, whichever is greater. The temperature monitor and recorder shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and the operating manuals, with any modifications deemed necessary by the permittee.
 - (3) The permittee shall collect and record the following information each day for the coating line and maintain the information at the facility for a period of three years:
 - a. The name and identification number of each coating used.
 - b. The mass of VOC per unit volume of coating solids, as applied, the volume solids content, as applied, and the volume, as applied, of each coating.
 - c. The maximum VOC content (mass of VOC per unit volume of coating solids, as applied) or the daily volume-weighted average VOC content (mass of VOC per unit volume of coating solids, as applied) of all the coatings.

- d. The calculated, controlled VOC emission rate, in mass of VOC per unit volume of coating solids, as applied. The controlled VOC emission rate shall be calculated using (a) either the maximum VOC content or the daily volume-weighted VOC content recorded in accordance with paragraph (B)(3)(j)(iii) of this rule and (b) the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the source was in compliance.
 - e. A log or record of operating time for the capture (collection) system, control device, monitoring equipment, and the associated coating line.
 - f. all three-hour periods of operation during which the average combustion temperature was more than fifty degrees Fahrenheit below the average combustion temperature during the most recent performance test that demonstrated that the source was in compliance.
- (4) The permittee shall collect and record the following information each month for this emissions unit:
- a. the name and identification number of each coating, as applied;
 - b. the VOC content of each coating, as applied, in pounds per gallon;
 - c. the individual HAP content of each coating, in pounds of individual HAP per gallon of coating, as applied;
 - d. the total combined HAP content of each coating, in pounds of combined HAP per gallon of coating, as applied [sum all the individual HAP contents from d)(2)c. above];
 - e. the number of gallons of each coating employed;
 - f. the name and identification of each cleanup material employed;
 - g. the number of gallons of each cleanup material employed;
 - h. the VOC content of each cleanup material, in pounds per gallon;
 - i. the individual HAP content of each cleanup material, in pounds of individual HAP per gallon of cleanup material, as applied;
 - j. the total combined HAP content of each cleanup material, in pounds of combined HAPs per gallon of cleanup material, as applied [sum all the individual HAP contents from d)(2)i. above];
 - k. the total uncontrolled VOC emissions from all coatings and cleanup materials employed, in pounds or tons;
 - l. the total individual HAP emissions from all coatings and cleanup materials employed, in pounds or tons per month [for each HAP the sum of d)(2)c. times d)(2)e. for each coating plus the sum of d)(2)i. times d)(2)g. for each cleanup material];

- m. the total combined HAP emissions from all coatings and cleanup materials employed, in pounds or tons per month [the sum of d)(2)d. times d)(2)e. for each coating plus the sum of d)(2)j. times d)(2)g. for each cleanup material];
 - n. the calculated, controlled VOC emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled VOC emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance;
 - o. the calculated, controlled individual HAP emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled individual HAP emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance; and
 - p. the calculated, controlled combined HAP emissions rate for all coatings and cleanup materials, in pounds or tons. The controlled combined HAP emissions rate shall be calculated using the overall control efficiency for the control equipment as determined during the most recent emission test that demonstrated that the emissions unit was in compliance.
- (5) The permittee shall install, operate, and maintain monitoring devices and a recorder that continuously monitor and record the differential pressure between the inside and outside of the permanent total enclosure when the emissions unit is in operation. The monitoring and recording devices shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, instructions, and operating manuals, with any modifications deemed necessary by the permittee.
- The permittee shall collect and record the following information each day:
- a. all three-hour blocks of time during which the difference in pressure between the permanent total enclosure and the surrounding areas is not maintained at or above the minimum pressure differential of 0.007 inches of water, as a three-hour average; and
 - b. a log or record of downtime for the capture (collection) system when the emissions unit was in operation.
- (6) The permittee shall measure, document/calculate, and maintain a permanent record of the following information for the permanent total enclosure, which may be the same record documented during the compliance test(s):
- a. the measured diameter of each natural draft opening;
 - b. the distance measured from each natural draft opening to each VOC emitting point;
 - c. the total calculated surface area of all natural draft openings and the surface area of the enclosure's four walls, floor, and ceiling;

- d. the calculation or demonstration that the distance from each VOC emitting point to each natural draft opening is at least 4 times the diameter of the opening; and
 - e. the calculation demonstrating that the sum of the surface areas of all of the natural draft openings to the enclosure is not more than 5 percent of the sum of the surface areas of the enclosure's four walls, floor, and ceiling.
- (7) The permittee shall maintain documentation of the manufacturer's recommendations, instructions, or operating manuals for the dry particulate filter, along with documentation of any modifications deemed necessary by the permittee. These documents shall be maintained at the facility and shall be made available to the appropriate Ohio EPA District Office or Local Air Agency upon request.
- (8) The permittee shall conduct periodic inspections of the dry particulate filter to determine whether it is operating in accordance with the manufacturer's recommendations, instructions, or operating manuals with any modifications deemed necessary by the permittee or operator. These inspections shall be performed at a frequency that shall be based upon the recommendation of the manufacturer and the permittee shall maintain a copy of the manufacturer's recommended inspection frequency and it shall be made available to the Ohio EPA upon request.
- (9) In addition to the recommended periodic inspections, not less than once each calendar year the permittee shall conduct a comprehensive inspection of the dry particulate filter while the emissions unit is shut down and perform any needed maintenance and repair to ensure that it is operated in accordance with the manufacturer's recommendations.
- (10) The permittee shall document each inspection (periodic and annual) of the dry particulate filter system and shall maintain the following information:
- a. the date of the inspection;
 - b. a description of each/any problem identified and the date it was corrected;
 - c. a description of any maintenance and repairs performed; and
 - d. the name of person who performed the inspection.

These records shall be maintained at the facility for not less than five years from the date the inspection and any necessary maintenance or repairs were completed and shall be made available to the appropriate Ohio EPA District Office or Local Air Agency upon request.

- (11) The permittee shall maintain records that document any time periods when the dry particulate filter was not in service when the emissions unit was in operation, as well as, a record of all operations during which the dry particulate filter was not operated according to the manufacturer's recommendations with any documented modifications made by the permittee. These records shall be maintained for a period of not less than five years and shall be made available to the Ohio EPA upon request.

- (12) The federally enforceable permit-to-install and operate (FEPTIO) application for emissions unit K008 was evaluated based on the actual materials and the design parameters of the emissions unit's exhaust system, 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 emitted at over one ton per year 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, (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. short term exposure limit (STEL) 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 then adjusted to account for the duration of the exposure or the operating hours of the emissions unit, 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):

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

- 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:

Pollutant: Formaldehyde
TLV (mg/m3): 0.37
Maximum Hourly Emission Rate (lbs/hr): 0.03
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 0.75
MAGLC (ug/m3): 8.77

The permittee, has demonstrated that emissions of formaldehyde from emissions unit K008 is calculated to be less than eighty percent 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).

- (13) Prior to making any physical changes to or changes in the method of operation of the emissions unit, 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 changes 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 or its 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 changes 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 changes meet the definition of a "modification", the permittee shall apply for and obtain a final FEPTIO prior to the change. The Director (appropriate Ohio EPA District Office or Local Air Agency) 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.

- (14) 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. 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 or the materials applied.
- (15) 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 summaries of the following records:
- a. all 3-hour blocks of time (when the emissions unit(s) was/were in operation) during which the average combustion temperature within the thermal oxidizer was more than 50 degrees Fahrenheit below the average temperature maintained during the most recent performance test that demonstrated the emissions unit(s) was/were in compliance;
 - b. any records of downtime (date and length of time) for the capture (collection) system, the thermal oxidizer, and/or the monitoring equipment when the emissions unit(s) was/were in operation; and
 - c. a log of the operating time for the capture system, thermal oxidizer, monitoring equipment, and the emissions unit(s).

These quarterly reports shall be submitted by April 30, July 31, October 31, and January 31, and shall cover the records for the previous calendar quarters.

- (2) The permittee shall submit quarterly deviation (excursion) reports that identify:
- a. all deviations (excursions) of the operational restrictions and/or control requirements that restrict the potential to emit (PTE) of any regulated air pollutant and have been detected by the monitoring, record keeping and/or testing requirements in this permit;
 - b. the probable cause of each deviation (excursion);
 - c. any corrective actions that were taken to remedy the deviations (excursions) or prevent future deviations (excursions); and
 - d. the magnitude and duration of each deviation (excursion).

If no deviations (excursions) occurred during a calendar quarter, the permittee shall submit a report that states that no deviations (excursions) occurred during the quarter.

The quarterly reports shall be submitted, electronically through Ohio EPA Air Services, each year by January 31 (covering October to December), April 30 (covering January to March), July 31 (covering April to June), and October 31 (covering July to September), unless an alternative schedule has been established and approved by the Director (the appropriate District Office or Local Air Agency).

- (3) The permittee shall submit an annual Permit Evaluation Report (PER) to the Ohio EPA. The PER must be completed electronically and submitted via the Ohio EPA eBusiness Center: Air Services 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.

The permittee shall include the following information in the annual PER:

- a. a log of operating time for the capture (collection) system, control device, monitoring equipment, and the associated emissions unit;
- b. all 3-hour blocks of time during which the average combustion temperature within the thermal incinerator was more than 50°F below the average temperature specified in c)(11);
- c. all three-hour blocks of time , when the emissions unit was in operation, during which the permanent total enclosure was not maintained at the minimum pressure differential of 0.007 inches of water; and
- d. any changes made to a parameter or value used in the dispersion model, that was used to maintain compliance with the "Toxic Air Contaminant Statute", ORC 3704.03(F), through the predicted 1-hour maximum ground-level concentration.

f) Testing Requirements

- (1) Compliance with the Emissions Limitations and/or Control Requirements specified in section b) of these terms and conditions shall be determined in accordance with the following methods:

a. Emissions Limitations:

VOC emissions associated with painting operations shall not exceed 2.28 pounds per hour and 10.0 tons per year

Applicable Compliance Methods:

Compliance with the hourly VOC emissions limitation identified above shall be demonstrated by multiplying the maximum production rate of 80 covers per minute by the paint application rate of 1 gallon per 600 covers, and the maximum VOC content of the coatings (5.7 pounds of VOC per gallon), and a conversion factor of 60 minutes per hour. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

b. Emissions Limitations:

VOC emissions associated with clean-up operations shall not exceed 11.07 pounds per week and 0.29 ton per year

Applicable Compliance Methods:

Compliance with the weekly VOC emissions limitation identified above shall be demonstrated by multiplying the maximum MEK usage rate for clean-up operations of 55 gallons per week by the emission factor of 6.71 pounds per gallon. This weekly emission rate is reduced by a recovery rate of forty percent (multiplied by a factor of 1 - 0.40), which is the weekly amount of MEK emitted prior to control. This emission rate is further reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per week limitation by 52 weeks per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the weekly emissions limitation.

c. Emissions Limitations:

VOC emissions associated with natural gas combustion shall not exceed 0.028 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emissions factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly VOC emissions limitations identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 5.5 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

d. Emissions Limitations:

NO_x emissions associated with natural gas combustion shall not exceed 0.50 pound per hour and 2.20 tons per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly NO_x emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 100 pounds of NO_x emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

e. Emissions Limitations:

SO₂ emissions associated with natural gas combustion shall not exceed 0.003 pound per hour and 0.01 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly SO₂ emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 0.6 pound of SO₂ emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

f. Emissions Limitations:

PE associated with natural gas combustion shall not exceed 0.038 pound per hour and 0.17 ton per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly PE limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 7.6 pounds of total particulates emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

g. Emissions Limitations:

CO emissions associated with natural gas combustion shall not exceed 0.42 pound per hour and 1.84 tons per year

Applicable Compliance Methods:

Emissions factors for natural gas combustion were chosen from SCC 1-02-006-03 which is a natural gas fired industrial boiler with a heat input capacity of less than 10 MMBtu per hour. The emission factors were obtained from EPA's FIRE Version 6.22.

Compliance with the hourly CO emissions limitation identified above shall be demonstrated by multiplying the emission factor of 5.0 MMBtu per hour by the number of cubic feet per 1,000 Btu and the emission factor of 84 pounds of VOC emitted per thousand cubic feet burned.

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

h. Emissions Limitations:

Formaldehyde emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Compliance with the hourly formaldehyde emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.7% formaldehyde), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

i. Emissions Limitations:

Methanol emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.14 ton per year

Applicable Compliance Methods:

Compliance with the hourly methanol emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.8% methanol), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

j. Emissions Limitations:

Xylene emissions associated with painting operations shall not exceed 0.25 pound per hour and 1.08 tons per year

Applicable Compliance Methods:

Compliance with the hourly xylene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (7.9% xylene), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

k. Emissions Limitations:

MIBK emissions associated with painting operations shall not exceed 0.04 pound per hour and 0.19 ton per year

Applicable Compliance Methods:

Compliance with the hourly MIBK emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (1.4% MIBK), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

l. Emissions Limitations:

Ethyl benzene emissions associated with painting operations shall not exceed 0.05 pound per hour and 0.22 ton per year

Applicable Compliance Methods:

Compliance with the hourly ethyl benzene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (1.6% ethyl benzene), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

m. Emissions Limitations:

Naphthalene emissions associated with painting operations shall not exceed 0.03 pound per hour and 0.12 ton per year

Applicable Compliance Methods:

Compliance with the hourly naphthalene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (0.7% naphthalene), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

n. Emissions Limitations:

Toluene emissions associated with painting operations shall not exceed 0.53 pound per hour and 2.32 tons per year

Applicable Compliance Methods:

Compliance with the hourly toluene emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight (17.0% toluene), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 7.80 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

o. Emissions Limitations:

MEK emissions associated with painting operations shall not exceed 0.91 pound per hour and 4.00 tons per year

Applicable Compliance Methods:

Compliance with the hourly MEK emissions limitation identified above shall be demonstrated by multiplying the maximum HAP concentration, by weight after thinning (23.5% MEK), by the maximum allowable paint usage rate of 8.0 gallons per hour and the emission factor of 9.70 pounds per gallon. This hourly emission rate is reduced by the destruction efficiency of the regenerative thermal oxidizer calculated by the most recent compliance test (multiplied by a factor of 1 - destruction efficiency percentage).

The annual emissions limitation was established by multiplying the pound per hour limitation by the maximum operating time of 8,760 hours per year, and dividing by a conversion factor of 2,000 pounds per ton. Therefore, compliance with the annual emissions limitation shall be demonstrated provided compliance is maintained with the hourly emissions limitation.

p. Emissions Limitation:

PE shall not exceed 20% opacity, as a 6-minute average

Applicable Compliance Methods:

Compliance with the opacity limitation identified above shall be demonstrated in accordance with the test methods and procedures specified in OAC rule 3745-17-03(B)(1).

(2) The permittee shall conduct, or have conducted, emissions testing for this emissions unit in accordance with the following requirements:

- a. Emissions testing shall be conducted prior to July 29, 2012 and within 6 months prior to the permit expiration.
- b. The emissions testing shall be conducted to demonstrate compliance with the following capture efficiency and control efficiency limitations for VOC:

When either emissions unit K001 or K008 or both are in operation, the permittee shall employ a regenerative thermal oxidizer which shall provide not less than an eighty one per cent reduction, by weight, in the overall VOC emissions from the coating line and that the control equipment has an efficiency of not less than ninety per cent, by weight, for the VOC emissions vented to the control equipment.

- c. The following test method(s) shall be employed to demonstrate compliance with the allowable mass emission rate(s): for VOC, Method 25 or 25A (whichever is appropriate) of 40 CFR Part 60, Appendix A. The test method(s) which must be employed to demonstrate compliance with the capture efficiency and control efficiency limitations for VOC are specified below. Alternative U.S. EPA approved test methods may be used with prior approval from the Ohio EPA.

The capture efficiency shall be determined using Methods 204 through 204F, as specified in 40 CFR Part 51, Appendix M, or the permittee may request to use an alternative method or procedure for the determination of capture efficiency in accordance with the USEPA's "Guidelines for Determining Capture Efficiency," dated January 9, 1995. (The Ohio EPA will consider the request, including an evaluation of the applicability, necessity, and validity of the alternative, and may approve the use of the alternative if such approval does not contravene any other applicable requirement.)

The control efficiency (i.e., the percent reduction in mass emissions between the inlet and outlet of the control system) shall be determined in accordance with the test methods and procedures specified in OAC rule 3745-21-10 or an alternative test protocol approved by the Ohio EPA. The test methods and procedures selected shall be based on a consideration of the diversity of the organic species present and their total concentration, and on a consideration of the potential presence of interfering gases.

- d. The test(s) shall be conducted under those representative conditions that challenge to the fullest extent possible a facility's ability to meet the applicable emissions limits and/or control requirements, unless otherwise specified or approved by the appropriate Ohio EPA District Office or Local Air Agency. Although this generally consists of operating the emissions unit at its maximum material input/production rates and results in the highest emission rate of the tested pollutant, there may be circumstances where a lower emissions loading is deemed the most challenging control scenario. Failure to test under these conditions is justification for not accepting the test results as a demonstration of compliance.
- e. Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the appropriate Ohio EPA District Office or Local Air Agency. The "Intent to Test" notification shall describe in detail the proposed test methods and procedures, the emissions unit operating parameters, the time(s) and date(s) of the test(s), and the person(s) who will be conducting the test(s). Failure to submit such notification for review and approval prior to the test(s) may result in the Ohio EPA District Office's or Local Air Agency's refusal to accept the results of the emission test(s).
- f. Personnel from the appropriate Ohio EPA District Office or Local Air Agency shall be permitted to witness the test(s), examine the testing equipment, and acquire data and information necessary to ensure that the operation of the emissions unit and the testing procedures provide a valid characterization of the emissions from the emissions unit and/or the performance of the control equipment.

- g. A comprehensive written report on the results of the emissions test(s) shall be signed by the person or persons responsible for the tests and submitted to the appropriate Ohio EPA District Office or Local Air Agency within 30 days following completion of the test(s). The permittee may request additional time for the submittal of the written report, where warranted, with prior approval from the appropriate Ohio EPA District Office or Local Air Agency.

g) Miscellaneous Requirements

- (1) None.