

Facility ID: 0247170841 Issuance type: Final State Permit To Operate

This version of facility specific terms and conditions was converted from a database format to an HTML file during an upgrade of the Ohio EPA, Division of Air Pollution Control's permitting software. Every attempt has been made to convert the terms and conditions to look and substantively conform to the permit issued or being drafted in STARS. However, the format of the terms may vary slightly from the original. In addition, although it is not expected, there is a slight possibility that a term and condition may have been inadvertently "left out" of this reproduction during the conversion process. Therefore, if this version is to be used as a starting point in drafting a new version of a permit, it is imperative that the entire set of terms and conditions be reviewed to ensure they substantively mimic the issued permit. The official version of any permit issued final by Ohio EPA is kept in the Agency's Legal section. The Legal section may be contacted at (614) 644-3037.

In addition to the terms and conditions, hyperlinks have been inserted into the document so you may more readily access the section of the document you wish to review.

Finally, the term language under "Part II" and before "A. Applicable Emissions Limitations..." has been added to aid in document conversion, and was not part of the original issued permit.

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Facility ID: 0247170841 Emissions Unit ID: K007 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Stream coating line number STR-2	OAC rule 3745-31-05(A)(3) PTI number 02-15400	<p>Volatile organic compound (VOC) emissions shall not exceed 36 pounds per day, excluding cleanup materials.</p> <p>VOC emissions shall not exceed 6.7 tons per year, including cleanup materials.</p> <p>This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C).</p>

OAC rule 3745-21-09(U)(1)(i) 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
 OAC rule 3745-31-05(C) See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
 The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
 The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
 The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
- The name and identification number of each coating employed;
  - The volume, in gallons, of each coating employed; and
  - The total volume, in gallons, of all of the coatings employed.
2. The permittee shall collect and record the following information each month for the coating line:
- The name and identification number of each coating and cleanup material, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The total volume, in gallons, of all cleanup materials employed;
  - The VOC content of each coating, as applied, in pounds per gallon;
  - The VOC content of each cleanup material, in pounds per gallon; and
  - The total VOC emissions from all coatings and cleanup materials employed [summation of (b x d) for all coatings and summation of (c x e) for cleanup materials], in tons.
3. The permittee shall collect and record the following information each month:  
 For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively)

and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 36 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
VOC emissions shall not exceed 36 pounds per day, excluding cleanup materials.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
VOC emissions shall not exceed 6.7 tons per year, including cleanup materials.  
Applicable Compliance Method:  
Compliance shall be determined by summing the monthly VOC emission rate in Section A.III.2 for the entire year.  
Emission Limitation:  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

- 1. None

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Facility ID: 0247170841 Emissions Unit ID: K009 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Dip spin line number 1 (DS-1)	OAC rule 3745-31-05(A)(3) PTI number 02-15400	<p>Volatile organic compound (VOC) emissions shall not exceed 62 pounds per day, excluding cleanup materials.</p> <p>VOC emissions shall not exceed 11.3 tons per year, including cleanup materials.</p> <p>This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents. See A.I.2.a and A.I.2.b below.</p>
	OAC rule 3745-21-09(U)(1)(i)	
	OAC rule 3745-31-05(C)	

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating employed;

- b. The volume, in gallons, of each coating employed; and
- c. The total volume, in gallons, of all of the coatings employed.
2. The permittee shall collect and record the following information each month for the coating line:
- a. The name and identification number of each coating and cleanup material, as applied;
- b. The volume, in gallons, of each coating, as applied;
- c. The total volume, in gallons, of all cleanup materials employed;
- d. The VOC content of each coating, as applied, in pounds per gallon;
- e. The VOC content of each cleanup material, in pounds per gallon; and
- f. The total VOC emissions from all coatings and cleanup materials employed [summation of (b x d) for all coatings and summation of (c x e) for cleanup materials], in tons.
3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].  
For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
- ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K009) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: 2-butoxyethanol  
TLV (ug/m3): 97,100  
Maximum Hourly Emission Rate (lbs/hr): 0.39  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 237  
MAGLC (ug/m3): 2300
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 62 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 62 pounds per day, excluding cleanup materials.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 11.3 tons per year, including cleanup materials.

Applicable Compliance Method:

Compliance shall be determined by summing the monthly VOC emission rate in Section A.III.2 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a

rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

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Facility ID: 0247170841 Emissions Unit ID: K010 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Dip spin line number 2 (DS-2) equipped with a catalytic oxidizer	OAC rule 3745-31-05(A)(3) PTI number 02-15400	Volatile organic compound (VOC) emissions shall not exceed 3.72 pounds per hour, including cleanup materials.  VOC emissions shall not exceed 16.3 tons per year, including cleanup materials.
	OAC rule 3745-21-09(B)(6)	81 percent overall reduction of VOCs by weight and 90 percent destruction for all solvent based coatings.
	OAC rule 3745-31-05(C)	The requirements of this rule are equivalent to the requirements of OAC rule 3745-31-05(A)(3). See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units

- K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.
2. The average temperature of the exhaust gases immediately before the catalyst bed, for any 3-hour block of time when the emissions unit is in operation, shall not be more than 50 degrees Fahrenheit below the average temperature during the most recent emission test that demonstrated the emissions unit was in compliance.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for the coating line and maintain the information at the facility for a period of three years:
- The name and identification number of each coating employed;
  - 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;
  - 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; and
  - The calculated, controlled VOC emissions rate, in mass of VOC per unit volume of coating solids, as applied. The controlled VOC emission 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 source was in compliance.
2. The permittee shall operate and maintain continuous monitors and recorder(s) which measure and record the temperature immediately upstream and downstream of the incinerator's catalyst bed when the emissions unit is in operation. Units shall be in degrees Fahrenheit. The monitoring and recording devices shall be capable of accurately measuring the desired parameter. The temperature monitors and recorder(s) shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's recommendations, with any modifications deemed necessary by the permittee.
3. The permittee shall collect and record the following information each day:
- All 3-hour blocks of time (when the emissions unit was in operation) during which the average temperature of the exhaust gases immediately before the catalyst bed was more than 50 degrees Fahrenheit below the average temperature during the most recent emission test that demonstrated the emissions unit was in compliance.
  - All 3-hour blocks of time (when the emissions unit was in operation) during which the average temperature difference across the catalyst bed was less than 80 percent of the average temperature difference during the most recent compliance test that demonstrated the emissions unit was in compliance.
  - A log of the downtime for the capture (collection) system, control device, and monitoring equipment, when the associated emissions unit was in operation.
4. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.1.2.a and A.1.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].  
For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
5. The permit to install for this emissions unit (K010) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: 2-ethoxyethanol  
 TLV (ug/m3): 18,400  
 Maximum Hourly Emission Rate (lbs/hr): 0.36  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 12.4  
 MAGLC (ug/m3): 440

Pollutant: glycol ether  
 TLV (ug/m3): 96,700  
 Maximum Hourly Emission Rate (lbs/hr): 1.7  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 57.96  
 MAGLC (ug/m3): 2300

Pollutant: phosphoric acid  
 TLV (ug/m3): 1000  
 Maximum Hourly Emission Rate (lbs/hr): 0.6  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 20.7  
 MAGLC (ug/m3): 24

Pollutant: MEK  
 TLV (ug/m3): 590,000  
 Maximum Hourly Emission Rate (lbs/hr): 2.0  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 69  
 MAGLC (ug/m3): 14,000

Pollutant: methyl alcohol  
 TLV (ug/m3): 262  
 Maximum Hourly Emission Rate (lbs/hr): 0.98  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 33.1  
 MAGLC (ug/m3): 6240

Pollutant: xylene  
 TLV (ug/m3): 434,200  
 Maximum Hourly Emission Rate (lbs/hr): 0.48  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 16.6  
 MAGLC (ug/m3): 10,340

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

Pollutant: petroleum naphtha  
 TLV (ug/m3): 1,399,000  
 Maximum Hourly Emission Rate (lbs/hr): 2.23  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 77.3  
 MAGLC (ug/m3): 33,300

Pollutant: ethylene glycol methyl ether  
 TLV (ug/m3): 24,200  
 Maximum Hourly Emission Rate (lbs/hr): 0.26  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 9.1  
 MAGLC (ug/m3): 580

Pollutant: ethyl alcohol  
 TLV (ug/m3): 1884  
 Maximum Hourly Emission Rate (lbs/hr): 0.9  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 30.4

MAGLC (ug/m3): 44,900

Pollutant: cyclohexanone  
 TLV (ug/m3): 96,300  
 Maximum Hourly Emission Rate (lbs/hr): 0.28  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 9.7  
 MAGLC (ug/m3): 2300

Pollutant: isopropyl alcohol  
 TLV (ug/m3): 983,000  
 Maximum Hourly Emission Rate (lbs/hr): 0.23  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 8.0  
 MAGLC (ug/m3): 23,400

Pollutant: toluene  
 TLV (ug/m3): 188,400  
 Maximum Hourly Emission Rate (lbs/hr): 3.72  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 129.7  
 MAGLC (ug/m3): 4500

**D. Reporting Requirements**

1. The permittee shall submit deviation (excursion) reports that identify all 3-hour blocks of time when the emissions unit was in operation during which the average temperature of the exhaust gases immediately before the catalyst bed or the average temperature difference across the catalyst bed does not comply with the temperature limitations specified above.
2. The permittee shall submit deviation (excursion) reports which identify each day where the average hourly VOC emission rate exceeded 3.72 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
 Emission Limitation:  
 VOC emissions shall not exceed 3.72 pounds per hour, including cleanup materials.  
 Applicable Compliance Method:  
 Compliance shall be based upon the record keeping requirements in Section A.III.  
 Emission Limitation:  
 81 percent overall reduction of VOCs by weight and 90 percent destruction for all solvent based coatings.  
 Applicable Compliance Method:  
 40 CFR Part 60, Appendix A, Methods 25, 25A, and 40 CFR Part 51, Appendix M, Method 204. Performance testing shall be in accordance with OAC rule 3745-21-10(C).  
 Emission Limitation:  
 VOC emissions shall not exceed 16.3 tons per year, including cleanup materials.  
 Applicable Compliance Method:  
 Compliance shall be determined by summing the daily VOC emissions in Section A.III for the entire year.  
 Emission Limitation:  
 The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
 Applicable Compliance Method:  
 Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
 Emission Limitation:  
 The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017,

K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.
3. The permittee shall conduct, or have conducted, emission testing for this emissions unit in accordance with the following requirements:
  - a. The emission testing shall be conducted within 6 months after issuance of this permit.
  - b. The emission testing shall be conducted to demonstrate compliance with the overall control efficiency limitation and destruction efficiency limitation for VOC of 81 percent and 90 percent, respectively.
  - c. The following test methods shall be employed to demonstrate compliance with the capture efficiency and control efficiency limitations for VOC:
    - i. Method 25 of 40 CFR Part 60, Appendix A, if the VOC concentrations as carbon in the outlet are greater than 50 ppm or Method 25A of 40 CFR Part 60, Appendix A, if the VOC concentrations as carbon in the outlet are less than 50 ppm; and
    - ii. Method 204 of 40 CFR Part 51, Appendix M.
      - d. Testing shall be conducted while the emissions unit is operating at or near its maximum capacity, unless otherwise specified or approved by the Ohio EPA Northeast District Office.
4. 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 "Guidelines for Determining Capture Efficiency" dated January 9, 1995. (The Ohio EPA will consider the request for the use of an alternative method, including an evaluation of the applicability, necessity, and validity of the alternative method, and may approve its use, if such approval does not contravene any other applicable requirement.)
 

The control or destruction efficiency defined as the percent reduction of 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. 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.
5. Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the Ohio EPA Northeast District Office. 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 Northeast District Office's refusal to accept the results of the emission test(s).

Personnel from the Ohio EPA Northeast District Office shall be permitted to witness the test(s), examine the testing equipment, and acquire data and information necessary to ensure that the operation of the emissions unit and the testing procedures provide a valid characterization of the emissions from the emissions unit and/or the performance of the control equipment.

A comprehensive written report on the results of the emissions test(s) shall be signed by the person or persons responsible for the test(s) and submitted to the Ohio EPA Northeast District Office 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 Ohio EPA Northeast District Office.

Failure to submit notification for review and approval prior to the test(s) may result in the Ohio EPA Northeast District Office's refusal to accept the results of the emission test(s).

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K011 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Stream coating line number STR-5	OAC rule 3745-31-05(A)(3) PTI number 02-15650	Volatile organic compound (VOC) emissions shall not exceed 43.8 pounds per day, excluding cleanup materials.  VOC emissions shall not exceed 8.05 tons per year, including cleanup materials.  This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents. See A.I.2.a and A.I.2.b below.
	OAC rule 3745-21-09(U)(1)(i)	
	OAC rule 3745-31-05(C)	

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating employed;
  - b. The volume, in gallons, of each coating employed; and
  - c. The total volume, in gallons, of all of the coatings employed.
2. The permittee shall collect and record the following information each month for the coating line:
  - a. The name and identification number of each coating and cleanup material, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The total volume, in gallons, of all cleanup materials employed;
  - d. The VOC content of each coating, as applied, in pounds per gallon;
  - e. The VOC content of each cleanup material, in pounds per gallon; and
  - f. The total VOC emissions from all coatings and cleanup materials employed [summation of (b x d) for all

coatings and summation of (c x e) for cleanup materials], in tons.

3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.1.2.a and A.1.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:
- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K011) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: 2-butoxyethanol  
TLV (ug/m3): 121,100  
Maximum Hourly Emission Rate (lbs/hr): 0.85  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 338  
MAGLC (ug/m3): 2881

Pollutant: SEC-butyl alcohol  
TLV (ug/m3): 305,000  
Maximum Hourly Emission Rate (lbs/hr): 0.81  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 322  
MAGLC (ug/m3): 7262

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 43.8 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
  
VOC emissions shall not exceed 43.8 pounds per day, excluding cleanup materials.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
  
VOC emissions shall not exceed 8.05 tons per year, including cleanup materials.  
  
Applicable Compliance Method:  
  
Compliance shall be determined by summing the monthly VOC emission rate in Section A.III.2 for the entire year.  
Emission Limitation:  
  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K014 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 11 with natural gas drying oven no. 203	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;

- d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K014) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 21.12 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings

and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

- 1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

**Facility ID: 0247170841 Emissions Unit ID: K015 Issuance type: Final State Permit To Operate**

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Index coater no. 1 with natural gas drying oven no. 26	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 24.64 pounds per day and 4.5 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K015) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

  - a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 24.64 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 24.64 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 4.5 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de

minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K016 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 4 with natural gas drying oven no. 214	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 15.84 pounds per day and 2.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:

The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K016) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

  - a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new

materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 15.84 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:

VOC emissions shall not exceed 15.84 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K017 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 14 with natural gas drying oven no. 15	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
  - The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
  - The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K017) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect

the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 21.12 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K018 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Optional coater with natural gas drying oven no. 9	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 8.8 pounds per day and 1.6 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015,

K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
  - The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
  - The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K018) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7

MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 8.8 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
 Emission Limitation:

VOC emissions shall not exceed 8.8 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 1.6 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K019 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Optional coater with natural gas drying oven no. 163	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 8.8 pounds per day and 1.6 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.
- The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.
- Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
- The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
- The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The VOC content of each coating, as applied, in pounds per gallon;
  - The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K019) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum

ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 8.8 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
 Emission Limitation:

VOC emissions shall not exceed 8.8 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 1.6 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K020 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 2 with natural gas drying oven no. 12	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year

from coating materials. See A.I.2.c below.

This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C).

OAC rule 3745-21-09(U)(1)(i)

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

OAC rule 3745-31-05(C)

See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.
- The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.
- Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
- The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
- The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The VOC content of each coating, as applied, in pounds per gallon;
  - The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition.

The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K020) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

- The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
- The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
- The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

- Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in

accordance with the following method(s):

Emission Limitation:

VOC emissions shall not exceed 21.12 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

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**Facility ID: 0247170841 Emissions Unit ID: K021 Issuance type: Final State Permit To Operate**

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

1. The specific operation(s), property, and/or equipment which constitute this emissions unit are listed in the following table along with the

applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from this unit shall not exceed the listed limitations, and the listed control measures shall be employed. Additional applicable emissions limitations and/or control measures (if any) may be specified in narrative form following the table.

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 4 with natural gas drying oven no. 14	OAC rule 3745-31-05(A)(3) PTI number 02-21579	Volatile organic compound (VOC) emissions shall not exceed 31.7 pounds per day and 5.8 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
- 2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
- 3. The permittee shall collect and record the following information each month:
  - For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
    - i. The name and identification number of each coating, as applied;
    - ii. The volume, in gallons, of each coating, as applied;
    - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
    - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
    - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
    - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all

coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

i. The total volume of natural gas burned; and

ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K021) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

- The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 31.7 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
- The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit.

The reports shall be submitted by January 31 of each year and cover the previous calendar year.

6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):

Emission Limitation:

VOC emissions shall not exceed 31.7 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 5.8 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K022 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 3 with natural gas drying oven no. 13	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 16.4 pounds per day and 3.0 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
- 2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
- 3. The permittee shall collect and record the following information each month:
  - For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
    - i. The name and identification number of each coating, as applied;
    - ii. The volume, in gallons, of each coating, as applied;
    - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;

- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
    - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
    - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K022) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

- 1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- 2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 16.4 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- 3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-

month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.

4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:

VOC emissions shall not exceed 16.4 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.0 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K023 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 5 with natural gas drying oven no. 15B	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:

For all coating lines at the facility as denoted in terms A.1.2.a and A.1.2.b above, including all de minimis and exempt coating lines:

- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K023) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of

non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.

2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:

VOC emissions shall not exceed 21.12 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K024 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 6 with natural gas drying oven no. 4	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 15.84 pounds per day and 2.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and

- e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].  
For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
- ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K024) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: butyl cellosolve  
TLV (ug/m3): 121,000  
Maximum Hourly Emission Rate (g/s): 1.11  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2880
- Pollutant: N-butanol  
TLV (ug/m3): 112,000  
Maximum Hourly Emission Rate (g/s): 1.05  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2660
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.
- The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":
- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 15.84 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 15.84 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use

formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

- 1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K025 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Index coater no. 2 with natural gas drying oven no. 5	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 31.7 pounds per day and 5.8 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

- 2. **Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:

- a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K025) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: butyl cellosolve  
TLV (ug/m3): 121,000  
Maximum Hourly Emission Rate (g/s): 1.11  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2880
- Pollutant: N-butanol  
TLV (ug/m3): 112,000  
Maximum Hourly Emission Rate (g/s): 1.05  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2660
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any

type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 31.7 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
  
VOC emissions shall not exceed 31.7 pounds per day.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
  
VOC emissions shall not exceed 5.8 tons per year.  
  
Applicable Compliance Method:  
  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

F. **Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K026 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

A. **Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Index coater no. 7 with natural gas drying oven no. 21	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 24.64 pounds per day and 4.5 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

2. **Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

B. **Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on

October 16, 2001.

The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K026) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial

Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 24.64 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
VOC emissions shall not exceed 24.64 pounds per day.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
VOC emissions shall not exceed 4.5 tons per year.  
Applicable Compliance Method:  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a

rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

- 2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

- 1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K027 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Vision coater no. 1 with natural gas drying oven no. 2	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 13.2 pounds per day and 2.4 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
  - The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
  - The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K027) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect

the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 13.2 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 13.2 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.4 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K028 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Vision coater no. 2 with natural gas drying oven no. 179	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 13.2 pounds per day and 2.4 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015,

K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
  - The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
  - The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K028) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
 

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7

MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 13.2 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
 Emission Limitation:

VOC emissions shall not exceed 13.2 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.4 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K029 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Auto nut coater no. 5 with natural gas drying oven no. 159	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 11.44 pounds per day and 2.1 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.
- The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.
- Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
- The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
- The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The VOC content of each coating, as applied, in pounds per gallon;
  - The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K029) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum

ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 11.44 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
 Emission Limitation:

VOC emissions shall not exceed 11.44 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.1 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K030 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Auto nut coater no. 6 with natural gas drying oven no. 19	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 11.44 pounds per day and 2.1 tons per year

from coating materials. See A.I.2.c below.

This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C).

OAC rule 3745-21-09(U)(1)(i)

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

OAC rule 3745-31-05(C)

See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.
- The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.
- Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
- The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.
- The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The VOC content of each coating, as applied, in pounds per gallon;
  - The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- The name and identification number of each coating, as applied;
  - The volume, in gallons, of each coating, as applied;
  - The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- The total volume of natural gas burned; and
  - The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition.

The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K030) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

#### D. Reporting Requirements

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 11.44 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

#### E. Testing Requirements

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in

accordance with the following method(s):

Emission Limitation:

VOC emissions shall not exceed 11.44 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.1 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

**Facility ID: 0247170841 Emissions Unit ID: K031 Issuance type: Final State Permit To Operate**

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

1. The specific operation(s), property, and/or equipment which constitute this emissions unit are listed in the following table along with the

applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from this unit shall not exceed the listed limitations, and the listed control measures shall be employed. Additional applicable emissions limitations and/or control measures (if any) may be specified in narrative form following the table.

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 1 with natural gas drying oven no. 208	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
- 2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
- 3. The permittee shall collect and record the following information each month:
  - For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
    - i. The name and identification number of each coating, as applied;
    - ii. The volume, in gallons, of each coating, as applied;
    - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
    - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
    - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
    - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all

coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

i. The total volume of natural gas burned; and

ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K031) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

- The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
- The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
- The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit.

The reports shall be submitted by January 31 of each year and cover the previous calendar year.

6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):

Emission Limitation:

VOC emissions shall not exceed 21.12 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K032 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 5 with natural gas drying oven no. 33	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 15.84 pounds per day and 2.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
- 2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
- 3. The permittee shall collect and record the following information each month:
  - For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
    - i. The name and identification number of each coating, as applied;
    - ii. The volume, in gallons, of each coating, as applied;
    - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;

- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
    - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
    - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K032) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

- 1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- 2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 15.84 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
- 3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-

month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.

4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:

VOC emissions shall not exceed 15.84 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K033 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 6 with natural gas drying oven no. 34	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 17.6 pounds per day and 3.2 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:

For all coating lines at the facility as denoted in terms A.1.2.a and A.1.2.b above, including all de minimis and exempt coating lines:

- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K033) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of

non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.

2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 17.6 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:

VOC emissions shall not exceed 17.6 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 3.2 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K034 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 13 with natural gas drying oven no. 16	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatil organic compound (VOC) emissions shall not exceed 15.84 pounds per day and 2.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and

- e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].  
For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
- ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K034) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: butyl cellosolve  
TLV (ug/m3): 121,000  
Maximum Hourly Emission Rate (g/s): 1.11  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2880
- Pollutant: N-butanol  
TLV (ug/m3): 112,000  
Maximum Hourly Emission Rate (g/s): 1.05  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
MAGLC (ug/m3): 2660
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.
- The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":
- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 15.84 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 15.84 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 2.9 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use

formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

- 1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K036 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Plug coater no. 16 with natural gas drying oven no. 209	OAC rule 3745-31-05(A)(3) PTI number 02-21600	Volatile organic compound (VOC) emissions shall not exceed 21.12 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

- 1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

- 1. The permittee shall collect and record the following information for each day for this coating line:

- a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
- For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].
- For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K036) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.11  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2880
- Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 1.05  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 1735.7  
 MAGLC (ug/m3): 2660
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any

type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.12 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
  
VOC emissions shall not exceed 21.12 pounds per day.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
  
VOC emissions shall not exceed 3.9 tons per year.  
  
Applicable Compliance Method:  
  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

F. **Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K037 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

A. **Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Bolt coater no. 12 with natural gas drying oven no. 11	OAC rule 3745-31-05(A)(3) PTI number 02-22161	Volatile organic compound (VOC) emissions shall not exceed 21.1 pounds per day and 3.9 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

2. **Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

B. **Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on

October 16, 2001.

The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
  - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
  - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

  - i. The name and identification number of each coating, as applied;
  - ii. The volume, in gallons, of each coating, as applied;
  - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
  - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
  - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
  - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

  - i. The total volume of natural gas burned; and
  - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K037) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 0.046  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 192.9  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 0.046  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 192.9  
 MAGLC (ug/m3): 2660

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial

Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 21.1 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
VOC emissions shall not exceed 21.1 pounds per day.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
VOC emissions shall not exceed 3.9 tons per year.  
Applicable Compliance Method:  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a

rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

Facility ID: 0247170841 Emissions Unit ID: K050 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Fluoropolymer dip (FP-Dip) coater and electric drying oven 55 (OV-55)	OAC rule 3745-31-05(A)(3) PTI number 02-21113	Volatile organic compound (VOC) emissions shall not exceed 5.0 pounds per day and 0.91 ton per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:
 

The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PT1 number 02-15400 issued on October 16, 2001.

The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.
- C. **Monitoring and/or Record Keeping Requirements**
  1. The permittee shall collect and record the following information for each day for this coating line:
    - a. The name and identification number of each coating, as applied;
    - b. The volume, in gallons, of each coating, as applied;
    - c. The VOC content of each coating, as applied, in pounds per gallon;
    - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
    - e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
  2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
    - a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
  3. The permittee shall collect and record the following information each month:
 

For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

    - i. The name and identification number of each coating, as applied;
    - ii. The volume, in gallons, of each coating, as applied;
    - iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
    - iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
    - v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
    - vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:

    - i. The total volume of natural gas burned; and
    - ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
- D. **Reporting Requirements**
  1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
  2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 5.0 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
  3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
  4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
  5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.

6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
VOC emissions shall not exceed 5.0 pounds per day.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
VOC emissions shall not exceed 0.91 ton per year.  
Applicable Compliance Method:  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Applicable Compliance Method:  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

\*\*\*THIS IS NOT AN OFFICIAL VERSION OF THE PERMIT. SEE PAGE 1 FOR ADDITIONAL INFORMATION\*\*\*

**Facility ID: 0247170841 Emissions Unit ID: K051 Issuance type: Final State Permit To Operate**

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Dip-spin coating line number 3 with natural gas-fired drying oven that is rated less than 10 mmBtu and fired with only natural gas	OAC rule 3745-31-05(A)(3) PTI number 02-21446	Volatile organic compound (VOC) emissions shall not exceed 35.5 pounds per day and 6.5 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

(a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:

- The name and identification number of each coating, as applied;
- The volume, in gallons, of each coating, as applied;
- The VOC content of each coating, as applied, in pounds per gallon;
- The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and
- The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.

2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:

- The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.

3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:

- The name and identification number of each coating, as applied;
- The volume, in gallons, of each coating, as applied;
- The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;

v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and

vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].

For all combustion sources of HAPs at the facility as denoted in terms A.1.2.a and A.1.2.b above:

i. The total volume of natural gas burned; and

ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.

4. The permit to install for this emissions unit (K051) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):

Pollutant: butyl cellosolve  
 TLV (ug/m3): 121,000  
 Maximum Hourly Emission Rate (g/s): 1.4  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 928.5  
 MAGLC (ug/m3): 2880

Pollutant: N-butanol  
 TLV (ug/m3): 112,000  
 Maximum Hourly Emission Rate (g/s): 0.92  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 611.9  
 MAGLC (ug/m3): 2660

Pollutant: diethylene glycol  
 TLV (ug/m3): 166,000  
 Maximum Hourly Emission Rate (g/s): 0.83  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 553.9  
 MAGLC (ug/m3): 3950

Pollutant: secbutyl alcohol  
 TLV (ug/m3): 303,000  
 Maximum Hourly Emission Rate (g/s): 0.25  
 Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 163.5  
 MAGLC (ug/m3): 7220

Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:

a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);

b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and

c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 35.5 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):  
Emission Limitation:  
  
VOC emissions shall not exceed 35.5 pounds per day.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1.  
Emission Limitation:  
  
3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.  
Emission Limitation:  
  
VOC emissions shall not exceed 6.5 tons per year.  
  
Applicable Compliance Method:  
  
Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.  
Emission Limitation:  
  
The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.  
Emission Limitation:  
  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
  
Applicable Compliance Method:  
  
Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.
2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

**F. Miscellaneous Requirements**

1. None

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Facility ID: 0247170841 Emissions Unit ID: K052 Issuance type: Final State Permit To Operate

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**Part II - Special Terms and Conditions**

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) None.

**A. Applicable Emissions Limitations and/or Control Requirements**

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

<u>Operations, Property, and/or Equipment</u>	<u>Applicable Rules/Requirements</u>	<u>Applicable Emissions Limitations/Control Measures</u>
Stream coating line number 6 with natural gas-fired drying oven that is rated less than 10 mmBtu and fired with only natural gas	OAC rule 3745-31-05(A)(3) PTI number 02-21446	Volatile organic compound (VOC) emissions shall not exceed 52.8 pounds per day and 9.64 tons per year from coating materials. See A.I.2.c below.
	OAC rule 3745-21-09(U)(1)(i)	This rule also includes the requirements of OAC rule 3745-21-09(U)(1)(i) and OAC rule 3745-31-05(C). 3.0 pounds VOC per gallon of coating, excluding water and exempt solvents.
	OAC rule 3745-31-05(C)	See A.I.2.a and A.I.2.b below.

**2. Additional Terms and Conditions**

- (a) The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.  
The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.  
Based upon the permittee's application, there are no cleanup materials associated with this emissions unit.

**B. Operational Restrictions**

1. The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not cause volatile organic compound emissions to exceed 99.5 tons, based upon a rolling, 12-month summation, as follows:  
The maximum annual volatile organic compound emissions from emissions unit K010 shall not exceed 16.3 tons per year (the corresponding material usage shall not exceed 326 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures), in accordance with PTI number 02-15400 issued on October 16, 2001.  
The maximum annual volatile organic material usage from coatings and cleanup materials from emissions units K007, K009, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis and exempt sources, shall not exceed 83.2 tons, based upon a rolling, 12-month summation of the volatile organic material usage figures.

**C. Monitoring and/or Record Keeping Requirements**

1. The permittee shall collect and record the following information for each day for this coating line:
  - a. The name and identification number of each coating, as applied;
  - b. The volume, in gallons, of each coating, as applied;
  - c. The VOC content of each coating, as applied, in pounds per gallon;
  - d. The total VOC emissions from all coatings employed [summation of (b x c) for all coatings]; and

- e. The VOC content of each coating, excluding water and exempt solvents, in pounds per gallon.
2. The permittee shall collect and record the following information for the purpose of determining annual VOC emissions for this coating line:
- a. The total VOC emissions from all coatings employed (summation of A.III.1.d above for each month), in pounds or tons.
3. The permittee shall collect and record the following information each month:  
For all coating lines at the facility as denoted in terms A.I.2.a and A.I.2.b above, including all de minimis and exempt coating lines:
- i. The name and identification number of each coating, as applied;
- ii. The volume, in gallons, of each coating, as applied;
- iii. The individual HAP content for each HAP in each coating, as applied, in pounds per gallon;
- iv. The combined HAP contents for each HAP in each coating, as applied, in pounds per gallon;
- v. The total HAP emissions for all coating lines of each single HAP [summation of (ii x iii) for all coatings; for coating lines with control equipment (ii x iii) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions]; and
- vi. The total combined HAP emissions for all coating lines [summation of (ii x iv) for all HAPs emitted from all coating lines; for coating lines with control equipment (ii x iv) shall be multiplied by the overall control efficiency determined during the most recent emission test that demonstrated that the source was in compliance and added to the total sum of HAP emissions].  
For all combustion sources of HAPs at the facility as denoted in terms A.I.2.a and A.I.2.b above:
- i. The total volume of natural gas burned; and
- ii. The total HAP emissions calculated using emission factors from AP-42, Section 1.4, 7/98 or any later edition. The total combined HAP emissions for all emissions units of each single HAP and total combined HAPs [summation of III.3.a.vi for all HAPs emitted by the coating lines (single HAP and combined HAPs, respectively) and III.3.b.ii for all HAP emissions from combustion sources] per rolling, 12-month period.
4. The permit to install for this emissions unit (K052) was evaluated based on the actual materials employed and design parameters of the emissions unit's exhaust system, as specified by the permittee in the permit to install application. The Ohio EPA's "Review of New Sources of Air Toxic Emissions" policy ("Air Toxic Policy") was applied for each pollutant potentially emitted by this emissions unit using data from the permit to install application and the SCREEN 3.0 model (or other Ohio EPA approved model). The predicted 1-hour maximum ground-level concentration from the use of the SCREEN 3.0 model was compared to the Maximum Acceptable Ground-Level Concentration (MAGLC). The following summarizes the results of the modeling for the "worst case" pollutant(s):
- Pollutant: butyl cellosolve  
TLV (ug/m3): 121,000  
Maximum Hourly Emission Rate (g/s): 1.4  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 928.5  
MAGLC (ug/m3): 2880
- Pollutant: N-butanol  
TLV (ug/m3): 112,000  
Maximum Hourly Emission Rate (g/s): 0.92  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 611.9  
MAGLC (ug/m3): 2660
- Pollutant: diethylene glycol  
TLV (ug/m3): 166,000  
Maximum Hourly Emission Rate (g/s): 0.83  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 553.9  
MAGLC (ug/m3): 3950
- Pollutant: secbutyl alcohol  
TLV (ug/m3): 303,000  
Maximum Hourly Emission Rate (g/s): 0.25  
Predicted 1-Hour Maximum Ground-Level Concentration (ug/m3): 163.5  
MAGLC (ug/m3): 7220
- Physical changes to or changes in the method of operation of the emissions unit after its installation could affect the parameters used to determine whether or not the "Air Toxic Policy" is satisfied. Consequently, prior to making a change that could impact such parameters, the permittee shall conduct an evaluation to determine that the "Air Toxic Policy" will be satisfied. If, upon evaluation, the permittee determines that the "Air Toxic Policy" will not be satisfied, the permittee will not make the change. Changes that can affect the parameters used in applying the "Air Toxic Policy" include the following:
- a. changes in the composition of the materials used (typically coatings or cleanup materials), or the use of new materials, that would result in the emission of a compound with a lower Threshold Limit Value (TLV), as indicated in the most recent version of the handbook entitled "American Conference of Governmental Industrial Hygienists (ACGIH)", than the lowest TLV value 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 pollutant with a listed TLV that was proposed in the application and modeled; 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 "Air Toxic Policy" will be satisfied for the above changes, the Ohio EPA will not consider the change(s) to be a "modification" under OAC rule 3745-31-01 solely due to the emissions of any type of toxic air contaminant not previously emitted, and a modification of the existing permit to install would not be required. If the change(s) is (are) defined as a modification under other provisions of the modification definition, then the permittee shall obtain a final permit to install prior to the change.

The permittee shall collect, record, and retain the following information when it conducts evaluations to determine that the changed emissions unit will still satisfy the "Air Toxic Policy":

- a. a description of the parameters changed (composition of materials, new pollutants emitted, change in stack/exhaust parameters, etc.);
- b. documentation of its evaluation and determination that the changed emissions unit still satisfies the "Air Toxic Policy"; and
- c. where computer modeling is performed, a copy of the resulting computer model runs that show the results of the application of the "Air Toxic Policy" for the change.

**D. Reporting Requirements**

1. The permittee shall notify the Ohio EPA Northeast District Office in writing of any daily record showing the use of non-complying coatings (VOC content greater than 3.0 pounds VOC per gallon, excluding water and exempt solvents). The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
2. The permittee shall submit deviation (excursion) reports which identify each day where the daily VOC emission rate exceeded 52.8 pounds per day for this emissions unit. The notification shall include a copy of such record and shall be sent to the Ohio EPA Northeast District Office within 30 days after the exceedance occurs.
3. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of any single HAP from all emissions units at the facility exceeded 9.9 tons per year, and the actual rolling, 12-month emissions of each such single HAP for each month.
4. The permittee shall submit deviation (excursion) reports which identify each month during which the rolling, 12-month emissions of combined HAPs from all emissions units at the facility exceeded 24.9 tons per year, and the actual rolling, 12-month emissions of combined HAPs for each such month.
5. The permittee shall submit annual reports which specify the actual annual VOC emissions for this emissions unit. The reports shall be submitted by January 31 of each year and cover the previous calendar year.
6. The permittee shall submit annual reports which summarize the facility-wide emissions of each single HAP and combined HAPs from all emissions units at the facility. The reports shall include emissions calculations, be submitted by January 31 of each year, and cover the previous calendar year.

**E. Testing Requirements**

1. Compliance with the emission limitations in Section A.I.1 of these terms and conditions shall be determined in accordance with the following method(s):
 

Emission Limitation:

VOC emissions shall not exceed 52.8 pounds per day.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1.

Emission Limitation:

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

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.1 and the testing requirements in Section A.V.2.

Emission Limitation:

VOC emissions shall not exceed 9.64 tons per year.

Applicable Compliance Method:

Compliance shall be determined by summing the daily VOC emission rate in Section A.III.1 for the entire year.

Emission Limitation:

The emissions of each single hazardous air pollutant (HAP) from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de minimis, exempt, and combustion sources, shall not exceed 9.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of HAP emissions for each single HAP.

Emission Limitation:

The emissions of the combined HAPs from emissions units K007, K009, K010, K011, K014, K015, K016, K017, K018, K019, K020, K021, K022, K023, K024, K025, K026, K027, K028, K029, K030, K031, K032, K033, K034, K036, K037, K050, K051, K052, and all other emission sources at the facility, including but not limited to de

minimis, exempt, and combustion sources, shall not exceed 24.9 tons per year, based upon a rolling, 12-month summation.

Applicable Compliance Method:

Compliance shall be based upon the record keeping requirements in Section A.III.3 and maintenance of a rolling, 12-month summation of combined HAP emissions.

2. OAC rule 3745-21-10(B). USEPA Methods 24 and 24A shall be used to determine VOC contents for (a) coatings and (b) flexographic and rotogravure printing inks and related coatings, respectively. If, pursuant to section 4.3 of Method 24, 40 CFR Part 60, Appendix A, an owner or operator determines that Method 24 or 24A cannot be used for a particular coating or ink, the permittee shall so notify the Administrator of the USEPA and shall use formulation data for that coating or ink to demonstrate compliance until the USEPA provides alternative analytical procedures or alternative precision statements for Method 24 or 24A.

F. **Miscellaneous Requirements**

1. None