



## State of Wisconsin \ DEPARTMENT OF NATURAL RESOURCES

Jim Doyle, Governor  
Scott Hassett, Secretary  
Scott A. Humrickhouse, Regional Director

West Central Region Air Program  
LaCrosse Service Center  
3550 Mormon Coulee Road, Rm. 104  
LaCrosse, Wisconsin 54601  
Fax 608-785-9990

June 11, 2007

FILE CODE: 4560-1  
FID # : 632009730  
PERMIT #: 632009730-F10

Mr. Bruce Corning, VP Management Systems  
Northern Engraving Corporation - Holmen  
P.O Box 377  
Sparta, WI 54656

Dear Mr. Corning:

The Air Management Program of the Department of Natural Resources has performed a preliminary review of the renewal application for air pollution control permit number 632009730-F04 regarding the operation of an existing printed/coated plastic sheet manufacturing facility.

The West Central Region Air Program, LaCrosse Area Office has prepared an analysis of the proposed renewal and has made a preliminary determination that it is approvable. The analysis and preliminary determination indicated that the emission limitations and special permit conditions in the attached draft permit should be included in any renewed permit which may be issued by the Department. Please review this draft permit carefully.

The Department will now accept public comments on the preliminary analysis and draft permit as required by ss. 285.62(3), (4) and (5), Wis. Stats. Comments will be received for 30 days after publication of a Class I Legal notice. The Department will publish this notice. **Please review the Draft Permit and provide your comments to the Department within the same 30 day period.**

The public input, if any, will also be reviewed to note if significant public interest in the project exists and whether a public hearing is warranted. If a hearing is warranted, it would be held within 60 days from the end of the public comment period.

This draft operation permit contains monitoring requirements relating to the emissions from an air contaminant source. Pursuant to s. 285.17(2)(b), Wis. Stats., the Department is notifying you of the proposed monitoring requirements in the attached draft permit. You have the opportunity to demonstrate to the Department that the proposed monitoring requirements are unreasonable considering, among other factors, monitoring requirements imposed on similar air contaminant sources. **Please review the monitoring requirements.** If you do seek review of the monitoring requirements, please notify me within 30 days of publication of the notice seeking public comment. Your request for review should identify the specific monitoring requirements you are challenging and provide any information you have to demonstrate that the monitoring requirements are unreasonable. If the Department's Air and Waste Division Administrator determines that the monitoring requirements are unreasonable, the Department may not impose the monitoring requirements. If the Administrator determines that the monitoring requirements are reasonable, you may obtain a review of that determination by the Secretary of the Department. If the Secretary determines that the monitoring requirements are unreasonable, the Department may not impose the monitoring requirements.

Please be advised that this is only a preliminary determination. If you have any questions regarding this matter, please feel free to contact me at 608-789-5544.

Sincerely,

Mary Oleson

Air Management Engineer

cc: GEF II – AM/7 – FESOP Renewal

Enclosure



## Appendix A1.



### PREAMBLE

An Asterisk (\*) throughout this document denotes legal authority, limitations and conditions which are **not** federally enforceable.

#### **Concurrent Permit Actions Performed as Part of the Review and Issuance of Permit 632009730-F10.**

Construction Permits Issued in Conjunction with Permit 632009730-F10 Under s. 285.61(8), Wis. Stats.: none

Revised Construction Permits Issued in Conjunction with Permit 632009730-F10 Under s. NR 406.11, Wis. Adm. Code: none

Operation (CONOP) Permits Issued in Conjunction with Permit 632009730-F10 Under s. 285.62(7)(b), Wis. Stats.: none

Revised Operation Permits Issued in Conjunction with Permit 632009730-F10 Under ss. NR 407.11, 407.12, 407.13 and/or 407.14, Wis. Adm. Code: none

**The following permits, orders, etc., are adopted, under ss. 285.65(3), Wis. Stats., NR 406.11(1)(c) and (d), NR 407.09(2)(d) and NR 407.15(3) and (4), Wis. Adm. Code, by Permit 632009730-F10 which then becomes the primary enforceable document:** EOP-10-KJC-83-32-081, MIA-10-KJC-83-42-053, 88-IRS-049, 91-POY-126, 91-POY-126-R1, 88-IRS-049-R1, EOP-10-KJC-83-32-081-R1, MIA-10-KJC-83-42-053-R1, 01-MEC-615, 632009730-F01, 632009730-F02, 05-MEC-314, 05-MEC-314-OP, 632009730-F03, 06-MEC-044, 06-MEC-044-OP, 632009730-F04

#### **Stack and Process Index:**

**Stack S03, Process P03 - 2 Lithographic Presses with a Natural Gas/Propane Drying Oven Rated at 1.25 mmBtu/hr - Installed 1991 (PLO-05-H and PLO-07-H)**

**Stack S08, Process P08 - 1 Roll Coater with Natural Gas/Propane Conveyor Oven - Installed 1991 (PCO-08-H)**

**Stack S09, Process P09 - Six screening lines with 2 screening machines and two screening lines with 1 screening machine for a total 14 screening machines. Plus four additional backup screening machines for temporary replacement of the original 14 machines. Only 14 machines shall be operated at any one time. Process P09 includes 8 ovens. Six of these ovens fire natural gas or propane and have a total combined heat input rating of 7.9 mmBtus per hour. Two ovens are electric ovens. Installed 1991 and 2001. Modified 2005 and 2006. (Screening lines PSO-12-H, PSO-27-H, PSO-21-H, PSO-18-H, PSO-26-H, PSO-23-H, PSO-H-31, PSO-H-30)**

**Stack S36, Process P36 - Towel Dryer - Installed 1991**

**Stack S40, Process P40 - Screen Cleaning Machine - Installed 1998**

**Stack S14, Process P14 - Miscellaneous Facility Wide Cleanup**

**Stack S50, Process P50 - Two Digital Printing Lines each with an IR Curing Oven - Installed 2001**

**Stack S60, Process P60 - Screening machine with a natural gas oven with attached UV curing unit. The heat input rating of the natural gas oven is 0.78 mmBtus per hour. Installed 2002**

#### **Insignificant Emission Units:**

Boiler, Turbine, and HVAC System Maintenance.

Convenience Space Heating (< 5 million BTU/hr Burning Gas, Liquid, or Wood).

Convenience Water Heating.

Internal Combustion Engines Used for Warehousing and Material Transport.  
Janitorial Activities.  
Maintenance of Grounds, Equipment, and Buildings (lawn care, painting, etc.).  
Office Activities.  
Sanitary Sewer and Plumbing Venting.  
Four UV-Cured Lithographic Presses  
Thermometer Metalizing Process  
Parts Dryer  
Ink Mixing Station  
Electirc Lab Oven  
Two each, 30,000 gallon propane storage tanks  
Adhesive Application Press  
Stock Room for paint, powder ink, solvents, and plastic  
Tool and Die repair room  
Punch Presses  
Photo Shears  
Thompson Presses  
Quality Control Room and Laboratory  
Flexlens  
Screenmaking

**Permit Shield** — Unless precluded by the Administrator of the US EPA, compliance with all emission limitations in this operation permit is considered to be compliance with all emission limitations established under ss. 285.01 to 285.87, Wis. Stats., and emission limitations under the federal clean air act, that are applicable to the source if the permit includes the applicable limitation or if the Department determines that the emission limitations do not apply. The following emission limitations were reviewed in the analysis and preliminary determination and were determined not to apply to this stationary source:

Process P03: Because the facility is not located in Kenosha, Kewaunee, Manitowoc, Milwaukee, Ozaukee, Racine, Sheboygan, Washington or Waukesha county the requirements of s. NR 422.142, Wis. Adm. Code do not apply to P03, pursuant to s. NR 422.142(1), Wis. Adm. Code.

Process P08: Because the facility is not located in Brown, Calumet, Dane, Dodge, Door, Fond du Lac, Jefferson, Kenosha, Kewaunee, Manitowoc, Milwaukee, Outagamie, Ozaukee, Racine, Rock, Sheboygan, Walworth, Washington, Waukesha or Winnebago counties and because the total VOC emissions from the facility, with all emission control equipment inoperative have not exceeded 100 tons per year, P08 is not subject to the limitations for fabric and vinyl coating in s. NR 422.08, Wis. Adm. Code, pursuant to s. NR 422.03(3), Wis. Adm. Code. Additionally the facility has elected restrictions to limit the volatile organic compound emissions to less than 100 tons per year.

Process P09: Because the facility is not located in Kenosha, Kewaunee, Manitowoc, Milwaukee, Ozaukee, Racine, Sheboygan, Washington or Waukesha county, P09 is exempt from the requirements of s. NR 422.145, Wis. Adm. Code, pursuant to s. NR 422.03(4m)(a), Wis. Adm. Code.

Process P14: Because cleanup (P14) is performed using a wipe cleaning operation and the facility is located outside of Kenosha, Kewaunee, Manitowoc, Milwaukee, Ozaukee, Racine, Sheboygan, Washington or Waukesha counties, it is exempt from the requirements of s. NR 423.03, Wis. Adm. Code, pursuant to s. NR 423.03(2)(g)1., Wis. Adm. Code. The cleanup solvent use (P14) is subject to general emission limitations for volatile organic compounds outline in ss. NR 419.03 and NR 419.04, Wis. Adm. Code which would be included in Part II of any operation permit issued by the Department.

Process P40: Because the facility is not located in brown, Calumet, Dane, Dodge, Door, Fond du Lac, Jefferson, Kenosha, Kewaunee, Manitowoc, Milwaukee, Outagamie, Ozaukee, Racine, Rock, Sheboygan, Washington or Waukesha counties, because the screen cleaning machine is a cold cleaner, and because not more than 1.5 gallons of solvent are added per day, P40 is exempt from the requirements of s. NR 423.03, Wis. Adm. Code, pursuant to s. NR 423.03(2)(a), Wis. Adm. Code. The screen cleaning machine is subject to the general emission limitations for volatile organic compounds outlined in ss. NR 419.03 and NR 419.04, Wis. Adm. Code which would be included in Part II of any operation permit issued by the Department.

**Process P50:** Because the facility is not located in Kenosha, Milwaukee, Ozaukee, Racine, Washington, or Waukesha counties, P50 is not subject to the limitations for plastic parts coating in s. NR 422.083, Wis. Adm. Code, pursuant to s. NR 422.083(1), Wis. Adm. Code.

**Facility:** Emissions from firing natural gas and propane, which are group I virgin fossil fuels, in the ovens associated with P03, P08, and P09 are exempt from ch. NR 445, Wis. Adm. Code requirements, pursuant to ss. NR 445.04(1)(c)1., (3)(c)1, (4)(c)1., and (4r)(b)1.; ss. NR 445.05(1)(c)1., (3)(c)1, (4)(c)1., and (4r)(b)1.; and s NR 445.07(5)(a), Wis. Adm. Code.

**Part I** — The headings for the areas in the permit are defined below. The legal authority for these limitations or methods follows them in [brackets].

**Pollutant** – This area will note which pollutant is being regulated by the permit.

**Limitations** – This area will list all applicable emission limitations that apply to the source, including case-by-case limitations such as Latest Available Control Techniques (LACT), Best Available Control Technology (BACT), or Lowest Achievable Emission Rate (LAER). It will also list any voluntary restrictions on hours of operation, raw material use, or production rate requested by the permittee to limit potential to emit.

**Compliance Demonstration** – The compliance demonstration methods outlined in this area may be used to demonstrate compliance with the associated emission limit or work practice standard listed under the corresponding **Limitations** column. The compliance demonstration area contains limits on parameters or other mechanisms that will be monitored periodically to ensure compliance with the limitations. The requirement to test as well as initial and periodic test schedules, if testing is required, will be stated here. Notwithstanding the compliance determination methods which the owner or operator of a sources is authorized to use under ch. NR 439, Wis. Adm. Code, the Department may use any relevant information or appropriate method to determine a source’s compliance with applicable emission limitations.

**Reference Test Methods, Recordkeeping, and Monitoring Requirements** – Specific US EPA Reference test methods or other approved test methods will be contained in this area and are the methods that must be used whenever testing is required. A reference test method will be listed even if no testing is immediately required. Also included in this area are any recordkeeping requirements and their frequency and reporting requirements. Accuracy of monitoring equipment shall meet, at a minimum, the requirements of s. NR 439.055(3) and (4), Wis. Adm. Code, as specified in Part II of this permit.

**Condition Type** – This area will specify other conditions that are applicable to the entire facility that may not be tied to one specific pollutant.

**Conditions** – Specific conditions usually applicable to the entire facility or compliance requirements.

**Compliance Demonstration** – This area contains monitoring and testing requirements and methods to demonstrate compliance with the conditions.

**PART II** — This section contains the general limitations that the permittee must abide by. These requirements are standard for most sources of air pollutants so they are included in this section with every permit.

**DRAFT AIR POLLUTION CONTROL OPERATION PERMIT RENEWAL**

EI FACILITY NO: 632009730

PERMIT NO.: 632009730-F10

TYPE: Synthetic Minor, Non-Part 70

In compliance with the provisions of Chapter 285, Wis. Stats., and Chapters NR 400 to NR 499, Wis. Adm. Code,

Name of Source: Northern Engraving Corporation

Street Address: 1023 Sand Lake Road,  
Holmen, La Crosse County, Wisconsin

Responsible Official, & Title: Mr. Bruce Corning, VP Management Systems

is authorized to operate a printed/coated plastic sheet manufacturing facility in conformity with the conditions herein.

**THIS OPERATION PERMIT EXPIRES**

**Date will be inserted at the time of issuance.**

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**A RENEWAL APPLICATION MUST BE SUBMITTED AT LEAST 6 MONTHS, BUT NOT MORE THAN 18 MONTHS, PRIOR TO THIS EXPIRATION DATE [ss. 285.66(3)(a), Wis. Stats. and NR 407.04(2), Wis. Adm. Code].**

**No permittee may continue operation of a source after the operation permit expires, unless the permittee submits a timely application for renewal of the permit. If you submit a timely application for renewal, the existing operation permit will not expire until the renewal application has been finally acted upon by DNR. [ss. 227.51(2), 285.62(8)(b), Wis. Stats. and NR 407.04(2), Wis. Adm. Code].**

This authorization requires compliance by the permit holder with the emission limitations, monitoring requirements and other terms and conditions set forth in Parts I and II hereof.

Dated at Wisconsin Rapids, Wisconsin,

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STATE OF WISCONSIN

DEPARTMENT OF NATURAL RESOURCES

For the Secretary

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Joseph Ancel

West Central Region Air Team Supervisor

**PART I  
SPECIFIC PERMIT CONDITIONS**

- A. *Part I.A. of this operation permit is effective so long as the permittee is operating under a Cooperative Agreement with the Department as entered into under s. 299.80 Wis. Stats. If any such Cooperative Agreement expires or is revoked for any reason, Part I.A. of this operation permit is no longer effective and Part I.B. becomes the effective operation permit for the facility. If any such Cooperative Agreement expires or is revoked for any reason, the permittee shall comply with any delayed compliance deadlines and practical interim requirements established by the Department in a written revocation decision until the Department issues the approvals required under chs. 280 to 295, Wis. Stats, that were replaced by the above referenced Cooperative Agreement.*

1. **Volatile Organic Compound Emissions**

a. **Limitations:**

(1) The total volatile organic compound emissions from the facility may not exceed 85 tons for each 12 consecutive month period. [s. 299.80(4)(b), Wis. Stats and s. 285.65(7), Wis. Stats.]

b. **Compliance Demonstration Methods:**

(1) Each month the permittee shall calculate the total volatile organic compound emissions from the facility as follows:

$$E = (1 \text{ ton}/2000 \text{ lbs}) \times \{[(U_1 \times W_1 \times C_1 \times G_1) + (U_2 \times W_2 \times C_2 \times G_2) + \dots + (U_n \times W_n \times C_n \times G_n)] - [(S_1 \times P_1) + (S_2 \times P_2) + \dots + (S_m \times P_m)]\}$$

where:

E is the monthly VOC emissions (tons/month);

U is the monthly usage of each ink, coating, solvent, or other VOC containing material used during the month (gallons/month);

W is the density of each ink, coating, solvent, or other VOC containing material used during the month (pounds/gallon)

C is the VOC content of each ink, coating, solvent, or other VOC containing material used during the month expressed as a weight fraction (i.e. if a material is 25% VOC by weight C would be 0.25);

G is a multiplier for VOC containing materials for which the VOC is emitted at other than 100% of its content;

n identifies each ink, coating, solvent or other VOC containing material used during the month;

S is the amount of each spent ink, coating, solvent or other VOC containing material recovered and shipped off site each month (gallons/month);

P is the VOC content of each spent ink, coating, solvent or other VOC containing material recovered and shipped off site each month in pounds per gallon;

m identifies each spent ink, coating, solvent or other VOC containing material recovered and shipped off site during the month.

[s. NR 407.09(4)(a)1., Wis. Adm. Code]

(2) To demonstrate compliance with condition I.A.1.a.(1), the permittee shall calculate the total volatile organic compound emissions from the facility over each 12 consecutive month period by summing the monthly volatile organic compound emissions as calculated in I.A.1.b.(1) for each consecutive 12 month period. This calculation shall be performed within twenty calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]

(3) The permittee shall use U.S. EPA Method 24, or coating manufacturer's formulation data to determine the VOC content ( $C_n$ ) and the density ( $W_n$ ) of the of the inks, coatings, solvents or other VOC containing materials used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]

(4) The permittee shall analyze the spent ink, coating, solvent and other VOC containing material recovered and shipped off site to determine the VOC content (P) no less than: (a) each time there is a substantial change to materials or process operations that may affect the characteristics of the waste stream; or (b) quarterly, which ever is most frequent. [s. NR 439.04(1)(d), Wis. Adm. Code]

**c. Record Keeping and Monitoring Requirements:**

(1) The permittee shall keep records of the following for each ink, coating, solvent, or other VOC containing material used at the facility:

- (a) A unique name or identification number; and
- (b) The VOC content, expressed as a weight fraction ( $C_n$ ).  
[s. NR 439.04(1)(d), Wis. Adm. Code]

(2) The permittee shall keep monthly records of:

- (a) The amount of each ink, coating, solvent, or other VOC containing material used in gallons per month ( $U_n$ );
- (b) The density of each ink, coating, solvent, or other VOC containing material used in pounds per gallon ( $W_n$ );
- (c) The G multiplier factor for the VOC in the material ( $G_n$ ), including adequate documentation to show the derivation and appropriateness of the multiplier factor;
- (d) The amount of spent ink, coating, solvent, or other VOC containing material recovered and shipped off site in gallons per month ( $S_m$ );
- (e) The VOC content of each spent ink, coating, solvent or other VOC containing material recovered and shipped off site in pounds per gallon ( $P_m$ ).
- (f) The total monthly VOC emissions from the facility in tons per month (E), as calculated in I.A.1.b.(1); and
- (g) The total VOC emissions from the facility in tons per year as calculated in I.A.1.b.(2).  
[s. NR 439.04(1)(d), Wis. Adm. Code]

**d. Reference Test Methods:**

(1) Reference Test Method for Volatile Organic Compound Emissions: Whenever compliance emission testing is required, US EPA Method 18, 25, 25A or 25B shall be used to demonstrate compliance. [s. NR 439.06(3)(a), Wis. Adm. Code]

(2) Reference Test Method for Volatile Organic Compound Content: Whenever VOC content testing is required, US EPA Method 24 or 24A shall be used to determine the organic solvent content, the volume of solids, the weight of solids, the water content and the density of inks. [s. NR 439.06(3)(b), Wis. Adm. Code]

**2. Hazardous Air Pollutant Emissions**

**a. Limitations:**

(1) The emissions of each hazardous air pollutant regulated by the Clean Air Act shall be less than 8 tons for each 12 consecutive month period. [s. 299.80(4)(b), Wis. Stats.] [s. 285.65(7), Wis. Stats.]

(2) The total emissions of all hazardous air pollutants regulated by the Clean Air Act combined shall be less than 20 tons for each 12 consecutive month period. [s. 299.80(4)(b), Wis. Stats.] [s. 285.65(7), Wis. Stats.]

**b. Compliance Demonstration Methods:**

(1) Each month the permittee shall calculate the total emissions of each hazardous air pollutant from the facility regulated by the Clean Air Act as follows:<sup>1</sup>

$$E_x = (1 \text{ ton}/2000 \text{ lbs}) \times \{[(U_1 \times W_1 \times H_1 \times F_1) + (U_2 \times W_2 \times H_2 \times F_2) + \dots + (U_n \times W_n \times H_n \times F_n)] - [(S_1 \times I_1) + (S_2 \times I_2) + \dots + (S_m \times I_m)]\}$$

where:

$E_x$  is the monthly emissions of each hazardous air pollutant regulated by the Clean Air Act (tons/month);

x identifies each HAP emitted from the facility

U is the monthly usage of each ink, coating, solvent, or other HAP containing material used during the month (gallons/month);

W is the density of each ink, coating, solvent, or other HAP containing material used during the month (pounds/gallon)

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<sup>1</sup> This calculation shall be performed for each hazardous air pollutant regulated by the Clean Air Act that is emitted from the facility.

H is the HAP content of each ink, coating, solvent, or other HAP containing material used during the month expressed as a weight fraction (i.e. if a material is 25% HAP by weight H would be 0.25);

F is a multiplier for HAP containing materials for which the HAP is emitted at other than 100% of its content;

n identifies each ink, coating, solvent or other HAP containing material used during the month;

S is the amount of each spent ink, coating, solvent or other HAP containing material recovered and shipped off site each month (gallons/month);

I is the HAP content of each spent ink, coating, solvent or other HAP containing material recovered and shipped off site each month in pounds per gallon;

m identifies each spent ink, coating, solvent or other HAP containing material recovered and shipped off site during the month.

[s. NR 407.09(4)(a)1., Wis. Adm. Code]

(2) To demonstrate compliance with condition I.A.2.a.(1), the permittee shall calculate the emissions of each hazardous air pollutant regulated by the Clean Air Act over each 12 consecutive month period by summing the monthly emissions of each hazardous air pollutant regulated by the Clean Air Act as calculated in I.A.2.b.(1) for each consecutive 12 month period. This calculation shall be performed within twenty calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]

(3) Each month the permittee shall calculate the total emissions of hazardous air pollutants regulated by the Clean Air Act as follows:

$$E_{\text{hap}} = \sum E_x$$

where:

$E_{\text{hap}}$  is the monthly total emissions of all hazardous air pollutants regulated by the Clean Air Act that are emitted by the facility (tons/month);

$E_x$  is the monthly emissions of each hazardous air pollutant regulated by the Clean Air Act (tons/month) as calculated in I.A.2.b.(1);

x identifies each HAP emitted from the facility.

[s. NR 407.09(4)(a)1., Wis. Adm. Code]

(4) To demonstrate compliance with condition I.A.2.a.(2), the permittee shall calculate the total emissions of all hazardous air pollutants regulated by the Clean Air Act over each 12 consecutive month period by summing the monthly emissions of all hazardous air pollutants regulated by the Clean Air Act as calculated in I.A.2.b.(3) for each consecutive 12 month period. This calculation shall be performed within twenty calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]

(5) The permittee shall use coating manufacturer's formulation data to determine the HAP content ( $H_n$ ) of the of the inks, coatings, solvents or other HAP containing materials used. [s. NR 439.04(1)(d), Wis. Adm. Code]

(6) The permittee shall analyze the spent ink, coating, solvent and other HAP containing material recovered and shipped off site to determine the HAP content (H) no less than: (a) each time there is a substantial change to materials or process operations that may affect the characteristics of the waste stream; or (b) quarterly, which ever is most frequent. [s. NR 439.04(1)(d), Wis. Adm. Code]

**c. Record Keeping and Monitoring Requirements:**

(1) The permittee shall keep records of the following for each ink, coating, solvent, or other HAP containing material used at the facility:

(a) A unique name or identification number; and

(b) The weight fraction of each HAP contained in the material ( $H_n$ ).

[s. NR 439.04(1)(d), Wis. Adm. Code]

(2) The permittee shall keep monthly records of:

(a) The amount of each ink, coating, solvent, or other HAP containing material used in gallons per month ( $U_n$ );

(b) The density of each ink, coating, solvent, or other HAP containing material used in pounds per gallon ( $W_n$ );

(c) The F multiplier factor for the HAP in the material ( $F_n$ ), including adequate documentation to show the derivation and appropriateness of the multiplier factor;

- (d) The amount of spent ink, coating, solvent, or other HAP containing material recovered and shipped off site in gallons per month ( $S_m$ );
  - (e) The amount of each HAP contained in each spent ink, coating, solvent or other HAP containing material recovered and shipped off site in pounds per gallon ( $I_m$ );
  - (f) The facility total monthly emissions of each HAP in tons per month ( $E_x$ ), as calculated in I.A.2.b.(1);
  - (g) The total monthly HAP emissions from the facility in tons per month ( $E_{hap}$ ), as calculated in I.A.2.b.(3);
  - (h) The facility total emissions of each HAP in tons per year as calculated in I.A.2.b.(2).; and
  - (i) The total HAP emissions from the facility in tons per year as calculated in I.A.2.b.(4).
- [s. NR 439.04(1)(d), Wis. Adm. Code]

**d. Reference Test Methods:**

(1) Reference Test Method for Hazardous Air Pollutant Emissions: Whenever compliance emission testing is required, a method approved by the Department in writing shall be used to demonstrate compliance. [s. NR 439.06(8), Wis. Adm. Code]

**3. Particulate Matter Emissions**

**a. Limitations:**

(1) Particulate matter emissions from each stack exhausting non-electric drying ovens and space heaters may not exceed 0.15 pounds per mmBtu of heat input to each stack. [s. NR 415.06(2)(a), Wis. Adm. Code]

**b. Compliance Demonstration Methods:**

(1) The permittee shall only fire natural gas and/or propane in each non-electric drying oven and space heater at the facility.<sup>2</sup> [ss. NR 407.09(1)(c)1.b., Wis. Adm. Code and 285.65(3) and 285.63(1)(a), Wis. Stats.]

**c. Record Keeping and Monitoring Requirements:**

(1) The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility.<sup>3</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]

**d. Reference Test Methods:**

(1) Reference Test Method for Particulate Matter Emissions: Whenever compliance emission testing is required, US EPA Methods 5 and Method 202 shall be used to demonstrate compliance. [s. NR 439.06(1), Wis. Adm. Code]

**4. Visible Emissions**

**a. Limitations:**

(1) The visible emissions from each of the stacks exhausting emissions units at the facility may not exceed 20% opacity [s. NR 431.05, Wis. Adm. Code]

**b. Compliance Demonstration Methods:**

<sup>2</sup> Because the maximum theoretical emissions while firing these fuels are less than the allowable limit of 0.15 pounds per million Btu heat input, limiting the type of fuel used is adequate to demonstrate compliance with the particulate matter emission limit. Maximum theoretical particulate matter emissions were calculated using an emission factor of 7.6 pounds per million cubic feet of natural gas fired from AP-42, 5th edition, ch. 1.4.

<sup>3</sup> This statement is sufficient because each non-electric drying oven is designed to only burn natural gas and/or propane.

(1) The permittee shall only fire natural gas and/or propane in each non-electric drying oven.<sup>4</sup> [ss. 285.65(3) and 285.63(1)(a), Wis. Stats.]

**c. Record Keeping and Monitoring Requirements:**

(1) The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility<sup>5</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]

**d. Reference Test Methods:**

(1) Reference Test Method for Visible Emissions: Whenever compliance emission testing is required, US EPA Method 9 shall be used to demonstrate compliance. [s. NR 439.06(9)(a)1., Wis. Adm. Code]

**5. Operational Flexibility**

**a. New Equipment Construction and Modification:** The permittee may commence construction or modification (but not operation) of new process equipment prior to obtaining a construction permit, provided the following conditions are met. The following conditions do not apply if a proposed project is exempt from the requirement to obtain a construction permit, pursuant to s. NR 406.04, Wis. Adm. Code. [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

(1) The permittee shall submit the following information to the Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI, 54601 **OR** other location specified by the Department:

(a) Two copies of a complete construction and operation permit application describing the proposed equipment;

(b) An application fee of \$1350 or other amount as required by s. NR 410.03(1)(d), Wis. Adm. Code; and

(c) Information describing how the interested persons group was notified of the proposed project.

[ss. 299.80(10) and (11)(b), Wis. Stats.]

(2) The Department shall process the permit application in accordance with ss. 285.60 through 285.69, Wis. Stats and ss. NR 406 and NR 407, Wis. Adm. Code, however, the permittee need not wait for permit issuance to commence construction. The Department shall process the permit application as both a construction permit and a significant revision to this operation permit and issue both permits simultaneously to reduce the administrative burden of issuing a construction permit that expires 18 months after issuance followed by an operation permit. The Department shall send an invoice outlining the fees required for processing the construction permit for the proposed project, including the fees for an expedited permit review authorized by s. NR 410.03(o), Wis. Adm. Code, less the \$1350 permit application fee. [ss. 299.80(2)(h), (4)(b), (10) and (11)(b), Wis. Stats.]

(3) The permittee shall pay the total amount of the fee invoice within 30 days of receipt.<sup>6</sup> [s. 299.80(10), Wis. Stats.]

(4) The permittee shall continue to comply with all the requirements of Part I.A. of this permit so long as the cooperative agreement is in affect.<sup>7</sup> [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

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<sup>4</sup> It is not expected that the visible emission limitation of 20% opacity would be exceeded while firing these fuels. Therefore restricting the type of fuel used is adequate to ensure compliance with the emission limitation for fuel burning installations. The remaining stacks at the facility exhaust volatile organic compound emissions, and visible emissions are not expected from these other emission points.

<sup>5</sup> This statement is sufficient because each non-electric drying oven is designed to only burn natural gas and/or propane.

<sup>6</sup> Pursuant to s. 299.80(10), Wis. Stats., a participant in a cooperative agreement shall pay the same fees required under chs. 280 to 295, Wis. Stats. that it would be required to pay if it had not entered into a cooperative agreement. Therefore, while the requirement to obtain a construction permit prior to installation is waived, the permittee is still required to pay the fees that would have been assessed had a construction permit been issued under ch. NR 406, wis. Adm. Code.

<sup>7</sup> By continuing to comply with the facility wide emission limitations outlined in Part I.A. the net emissions increase from any new sources or relocation of any existing sources from other facilities, will not exceed the major stationary source levels of s. NR 405.02(22)(a), Wis. Adm. Code triggering Prevention of Significant Deterioration (PSD) Requirements. The existing facility potential emissions of all criteria pollutants is less than 250 tons per year and the facility is not included in the source categories listed in s. NR 405.07(4), Wis. Adm. Code, therefore the existing facility is a synthetic minor source for

(5) Nothing in this section or in any Cooperative Agreement between the Department and the permittee shall be construed as a guarantee that the Department will issue an air pollution control construction and operation permit for a proposed project. The decision on whether to approve a permit application will be made according to the requirements of chapters NR 400 through NR 499, Wis. Adm. Code and s. 285.60 through 285.69, Wis. Stats. If the Department denies a permit application pursuant to ss 285.61 through 285.64, Wis. Stats. all costs and risks associated with installing and operating the proposed equipment shall be incurred solely by the permittee. In the event that the construction and operation permit application for the proposed project is denied, the permittee shall cease construction of the equipment in question immediately.

**b. New Equipment Operation:** The permittee may operate new process equipment, provided one of the following alternate scenarios are met. The following conditions do not apply if a proposed project is exempt from the requirement to obtain a construction permit, pursuant to s. NR 406.04, Wis. Adm. Code. [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

(1) *Alternate Scenario #1:* The permittee may operate new process equipment provided the permittee submits a complete construction and operation permit application as required by the conditions of I.A.5.a. and the Department issues a construction permit pursuant to ss. 285.60 through 285.69, Wis. Stats and ss. NR 406 and NR 407, Wis. Adm. Code. The permittee shall operate the new process equipment in compliance with the conditions contained in any construction permit issued by the Department. [s. NR 406.03, Wis. Adm. Code]

(2) *Alternate Scenario #2:* The permittee may initially operate new process equipment prior to obtaining a construction permit provided the permittee submits a complete construction and operation permit application as required by the conditions of I.A.5.a. and the following conditions are met: [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

- (a) The permittee shall submit two copies of the following information to the Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI, 54601 **OR** other location specified by the Department, 14 calendar days prior to the date of initial operation:
- (i) Information identifying all applicable requirements from the Wisconsin Statutes, Wisconsin Administrative Code, and federal Clean Air Act for the proposed equipment;
  - (ii) A quantification of the air pollution emissions that would result from the proposed project;
  - (iii) A computer dispersion modeling analysis showing the National Ambient Air Quality Standards will be protected if the proposed project results in an increase in potential particulate matter, sulfur dioxide, nitrogen oxide, and/or carbon monoxide emissions.
  - (iv) A computer dispersion modeling analysis showing the Acceptable Ambient Concentrations will be protected if the proposed project results in an increase in emissions of any hazardous air pollutant listed in ch. NR 445, Wis. Adm. Code so that the resulting facility total emissions of the hazardous air pollutant are above the corresponding Table Value(s) **OR** results in the emission of any hazardous air pollutant listed in ch. NR 445, Wis. Adm. Code that was not previously emitted, at a rate greater than its corresponding Table Value(s); and
  - (v) An analysis showing the proposed project will not cause the total facility wide potential emissions of particulate matter, sulfur dioxide, nitrogen oxides or carbon monoxide to exceed 100 tons per year. Any proposed new or relocated source that will result in the facility wide potential emissions of any one of these pollutants exceeding 100 tons per year is not eligible for this waiver. If the facility wide potential emissions of any one of the pollutants would be greater than 100 tons per year as the result of a proposed project, the permittee shall comply with the construction permit requirements outlined in ch. NR 406, Wis. Adm. Code and the significant operation permit revision requirements of s. NR 407.13, Wis. Adm. Code.<sup>8</sup>

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PSD purposes. Note: This facility is not located in an area designated nonattainment. Also, by continuing to comply with the facility wide emissions limitations, the potential emissions increase from any new sources or relocated existing sources will not exceed 100 tons per year after controls for any criteria pollutant. Therefore none of the changes will be considered a Type II action requiring an environmental assessment. Finally, by continuing to comply with the facility wide emission limitations, the facility would not become a major source for Part 70 purposes for either volatile organic compound or hazardous air pollutant emissions. Requirement I.A.5.a.(1)(g) of this permit requires that any changes that result in potential facility wide emissions of particulate matter, sulfur dioxide, nitrogen oxide or carbon monoxide emissions exceeding 100 tons per year follow permit issuance requirements of chs. NR 406 and NR 407, Wis. Adm. Code.

<sup>8</sup> This requirement is necessary because if the potential emissions of particulate matter, sulfur dioxide, nitrogen oxide or carbon monoxide emissions exceeds 100 tons the facility would be considered a major source for Part 70 purposes and would be required to obtain either a Part 70 source permit or a synthetic minor, non-Part 70 source permit containing conditions that limit the potential emissions of all criteria pollutants to less than 100 tons per year.

[ss. 299.80(10) and (11)(b), Wis. Stats.]

(b) The Department has 14 calendar days from the date that all the information outlined in (a) is received to request additional information or object to the proposed project. If the Department requests additional information during the original 14 calendar day period the Department shall have an additional 7 calendar days from the date of receipt of the information to request additional information or object to the proposed project. Under no scenario shall the Department have less than 14 days to review original submittal. If the Department does not respond within 14 calendar days from the date that all the information outlined in (a) is submitted, or within 7 days from the date that any additional information requested by the Department is submitted, whichever is later, the permittee may commence initial operation of the proposed equipment. The Department may provide written approval to commence initial operation of the proposed equipment prior to the end of the 14 calendar day period. If this is the case the permittee may commence initial operation upon receipt of this written approval. [ss. 299.80(2)(h) and (11)(b), Wis. Stats.]

(3) *Alternate Scenario #3:* The permittee may initially operate new process equipment prior to obtaining a construction permit provided the permittee submits a complete construction and operation permit application as required by the conditions of I.A.5.a. and the following conditions are met: [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

(a) The Department provides written approval to commence initial operation of the proposed equipment. This written approval shall only be provided after the Department completes an air quality dispersion modeling analysis to ensure that the national ambient air quality standards and acceptable ambient concentrations will be protected while the proposed equipment is operating; [s. NR 406.09, Wis. Adm. Code]

(b) The permittee shall comply with any specific conditions included in the Department's written approval to commence initial operation;

(4) The permittee shall continue to comply with all the requirements of Part I.A. of this permit so long as the cooperative agreement is in affect.<sup>9</sup> [s. 299.80(2)(h) and (4)(b), Wis. Stats.]

(5) Nothing in this section or in any Cooperative Agreement between the Department and the permittee shall be construed as a guarantee that the Department will issue an air pollution control construction and operation permit for a proposed project. The decision on whether to approve a permit application will be made according to the requirements of chapters NR 400 through NR 499, Wis. Adm. Code and s. 285.60 through 285.69, Wis. Stats. If the Department denies a permit application pursuant to ss 285.61 through 285.64, Wis. Stats. all costs and risks associated with installing and operating the proposed equipment shall be incurred solely by the permittee. In the event that the construction and operation permit application for the proposed project is denied, the permittee shall cease construction and/or operation of the equipment in question immediately.

## 6. **Facility Wide Reporting Requirements**

a. Submit the results of monitoring or a summary of monitoring results required by Part I.A. of this permit to the Department annually.

(1) The time period to be addressed by the submittal are: January 1 to December 31.

(2) The report shall be submitted to the Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI 54601, phone (608) 785-9000 within 30 days after the end of each reporting period.

(3) All deviations from and violations of applicable requirements shall be clearly identified in the submittal.

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<sup>9</sup> By continuing to comply with the facility wide emission limitations outlined in Part I.A. the net emissions increase from any new sources or relocation of any existing sources from other facilities, will not exceed the major stationary source levels of s. NR 405.02(22)(a), Wis. Adm. Code triggering Prevention of Significant Deterioration (PSD) Requirements. The existing facility potential emissions of all criteria pollutants is less than 250 tons per year and the facility is not included in the source categories listed in s. NR 405.07(4), Wis. Adm. Code, therefore the existing facility is a synthetic minor source for PSD purposes. Note: This facility is not located in an area designated nonattainment. Also, by continuing to comply with the facility wide emissions limitations, the potential emissions increase from any new sources or relocated existing sources will not exceed 100 tons per year after controls for any criteria pollutant. Therefore none of the changes will be considered a Type II action requiring an environmental assessment. Finally, by continuing to comply with the facility wide emission limitations, the facility would not become a major source for Part 70 purposes for either volatile organic compound or hazardous air pollutant emissions. Requirement I.A.5.a.(1)(g) of this permit requires that any changes that result in potential facility wide emissions of particulate matter, sulfur dioxide, nitrogen oxide or carbon monoxide emissions exceeding 100 tons per year follow permit issuance requirements of chs. NR 406 and NR 407, Wis. Adm. Code.

(4) Each submittal shall be certified by a responsible official as to the truth, accuracy and completeness of the report.  
[s. NR 439.03(1)(b), Wis. Adm. Code]

b. Submit a certification of compliance with the requirements of Part I.A. of this permit to the Department annually.

(1) The time period to be addressed by the report is the January 1 to December 31 period which precedes the report.

(2) The report shall be submitted to the Wisconsin Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI 54601, phone (608) 785-9000 within 60 days after the end of each reporting period.

(3) The information included in the report shall comply with the requirements of Part II Section N of this permit.

(4) Each report shall be certified by a responsible official as to the truth, accuracy and completeness of the report.

[s. NR 439.03(1)(c), Wis. Adm. Code]

## **7. Compliance Testing Requirements**

a. Whenever compliance emission tests are required by the Department:

(1) Any compliance emission tests required by the Department shall be conducted while operating at 100% capacity. If operation at 100% capacity is not feasible, the sources shall operate at a capacity which is approved by the Department in writing.

(2) The reference test methods outlined in this permit shall be used unless an alternate, U.S. EPA approved, test method is approved by the Department in writing.

(3) The Department shall be informed at least 20 working days prior to any tests so a Department representative can witness the testing.

(4) At the time of notification, a compliance test plan shall also be submitted for approval.

(5) Two copies of the report on any required tests shall be submitted to the Department for evaluation within 60 days after the tests.

[s. NR 439.07, Wis. Adm. Code]

## **8. Construction Permit Requirements**

(a) Construction Permit Expiration: Construction permit 06-MEC-044 expires August 2, 2007. Construction or modification and an initial operation period for equipment shakedown, testing and Department evaluation of operation to assure conformity with the permit conditions is authorized for each emissions unit covered in this permit. Please note that the sources covered by this permit are required to meet all emission limits and conditions contained in the permit at all times, including during the initial operation period. If 18 months is an insufficient time period for construction or modification, equipment shakedown, testing and Department evaluation of operation, the permit holder may request and the Department may approve in writing an extension of this permit. [ss. 285.60(1)(a)2 and 285.66(1), Wis. Stats.; s. NR 406.12, Wis. Adm. Code and 06-MEC-044]

**B.** *Part I.A. of this operation permit is effective so long as the permittee is operating under a Cooperative Agreement with the Department as entered into under s. 299.80 Wis. Stats. If any such Cooperative Agreement expires or is revoked for any reason, Part I.A. of this operation permit is no longer effective and Part I.B. becomes the effective operation permit for the facility. If any such Cooperative Agreement expires or is revoked for any reason, the permittee shall comply with any delayed compliance deadlines and practical interim requirements established by the Department in a written revocation decision until the Department issues the approvals required under chs. 280 to 295, Wis. Stats, that were replaced by the above referenced Cooperative Agreement.*

**1. P03, Stack S03 - 2 Lithographic Presses with a Natural Gas/Propane Drying Oven Rated at 1.25 mmBtu/hr- Installed 1991 (PLO-05-H and PLO-07-H)**

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<b>a.</b> Particulate Matter Emissions	<b>(a)</b> Emissions may not exceed 0.15 pounds per mmBtu heat input. [s. NR 415.06(2)(a), Wis. Adm. Code]	<b>(a)</b> The permittee shall only fire natural gas and/or propane in each drying oven. <sup>10</sup> [ss. NR 407.09(1)(c)1.b., Wis. Adm. Code and 285.65(3) and 285.63(1)(a), Wis. Stats.]	<b>(a)</b> <u>Reference Test Method for Particulate Matter Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 5 and Method 202 shall be used to demonstrate compliance. [s. NR 439.06(1), Wis. Adm. Code]  <b>(b)</b> The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility. <sup>11</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]
<b>b.</b> Visible Emissions	<b>(a)</b> Emissions may not exceed 20% opacity [s. NR 431.05, Wis. Adm. Code]	<b>(a)</b> The permittee shall only fire natural gas and/or propane in each drying oven. <sup>12</sup> [ss. 285.65(3) and 285.63(1)(a), Wis. Stats.]	<b>(a)</b> <u>Reference Test Method for Visible Emissions:</u> Whenever compliance emission testing is required, US EPA Method 9 shall be used to demonstrate compliance. [s. NR 439.06(9)(a)1., Wis. Adm. Code]  <b>(b)</b> The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility. <sup>13</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]

<sup>10</sup> Because the maximum theoretical emissions while firing these fuels are less than the allowable limit of 0.15 pounds per million Btu heat input, limiting the type of fuel used is adequate to demonstrate compliance with the particulate matter emission limit. Maximum theoretical particulate matter emissions were calculated using an emission factor of 7.6 pounds per million cubic feet of natural gas fired from AP-42, 5th edition, ch. 1.4.

<sup>11</sup> This statement is sufficient because each drying oven is designed to only burn natural gas and/or propane.

<sup>12</sup> It is not expected that the visible emission limitation of 20% opacity would be exceeded while firing these fuels. Therefore restricting the type of fuel used is adequate to ensure compliance with the emission limitation.

<sup>13</sup> This statement is sufficient because each drying oven is designed to only burn natural gas and/or propane.

1. P03, Stack S03 - 2 Lithographic Presses with a Natural Gas/Propane Drying Oven Rated at 1.25 mmBtu/hr- (Continued)

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p>c. Volatile Organic Compounds</p>	<p>(a) <u>Latest Available Control Techniques:</u> The permittee may not use coatings or inks with a VOC content greater than 1.8 pounds per gallon as applied. [s. NR 424.03(2)(c), Wis. Adm. Code]</p>	<p>(a) The permittee shall maintain the records required by I.B.1.c.(3)(c) to demonstrate compliance with I.B.1.c.(1)(a). [s. NR 407.09(4), Wis. Adm. Code]</p>	<p>(a) <u>Reference Test Method for Volatile Organic Compound Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p>(b) <u>Reference Test Method for Volatile Organic Compound Content:</u> Whenever compliance testing is required, U.S. EPA Method 24 shall be used to demonstrate compliance with the VOC content limitations. [s. NR 439.06(3)(b), Wis. Adm. Code]</p> <p>(c) The permittee shall keep the following records for each ink and other VOC containing materials used on the presses:                      (a) A unique name of identification number for each ink and other VOC containing material, as applied; and                      (b) The VOC content of each ink and other VOC containing material, as applied, in pounds per gallon.                      [s. NR 439.04(1)(d), Wis. Adm. Code.]</p> <p>(d) The permittee shall use U.S. EPA Method 24, or ink manufacturer's formulation data to determine the VOC content of the of the inks used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

2. P08, Stack S08 - 1 Roll Coater with a Natural Gas/Propane Conveyor Oven rated at 0.8 mmBtu/hr - Installed 1991 (PCO-08-H)

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p>a. Volatile Organic Compounds</p>	<p>(a) <u>Latest Available Control Techniques:</u>                      (i) The permittee may not use coatings or inks with a VOC content greater than 7.1 pounds per gallon as applied.                      (ii) The permittee may not use more than 500 gallons of coating per month, averaged over each 12-consecutive month period                      [s. NR 424.03(2)(c), Wis. Adm. Code]</p>	<p>(a) The permittee shall maintain the records required by I.B.2.a.(3)(c) to demonstrate compliance with I.B.2.a.(1)(a)(i). [s. NR 407.09(4), Wis. Adm. Code]</p> <p>(b) To demonstrate compliance with condition I.B.2.a.(1)(a)(ii), the permittee shall calculate the total gallons of coating used, averaged over each 12 consecutive month period by dividing the total gallons of coating used during each consecutive 12 month period by 12. This calculation shall be performed within fifteen calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p>	<p>(a) <u>Reference Test Method for Volatile Organic Compound Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p>(b) <u>Reference Test Method for Volatile Organic Compound Content:</u> Whenever compliance testing is required, U.S. EPA Method 24 shall be used to demonstrate compliance with the VOC content limitations. [s. NR 439.06(3)(b), Wis. Adm. Code]</p> <p>(c) The permittee shall keep the following records for each coating and other VOC containing materials used on the coater:                      (i) A unique name of identification number for each coating and other VOC containing material, as applied; and                      (ii) The VOC content of each coating and other VOC containing material, as applied, in pounds per gallon. [s. NR 439.04(1)(d), Wis. Adm. Code.]</p> <p>(d) The permittee shall use U.S. EPA Method 24, or coating manufacturer's formulation data to determine the VOC content of the of the inks used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p> <p>(e) The permittee shall keep monthly records of:                      (i) The amount of coating used on the coater in gallons per month; and                      (ii) The total gallons of coatings used averaged over each 12 consecutive month period as calculated in condition I.B.2.a.(2)(b). [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

2. P08, Stack S08 - 1 Roll Coater with Natural Gas/Propane Conveyor Oven - (Continued)

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
b. Visible Emissions	(a) Emissions may not exceed 20% opacity [s. NR 431.05, Wis. Adm. Code]	(a) The permittee shall only fire natural gas and/or propane in the conveyor oven. <sup>14</sup> [ss. 285.65(3) and 285.63(1)(a), Wis. Stats.]	(a) <u>Reference Test Method for Visible Emissions:</u> Whenever compliance emission testing is required, US EPA Method 9 shall be used to demonstrate compliance. [s. NR 439.06(9)(a)1., Wis. Adm. Code]  (b) The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility. <sup>15</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]

<sup>14</sup> It is not expected that the visible emission limitation of 20% opacity would be exceeded while firing these fuels. Therefore restricting the type of fuel used is adequate to ensure compliance with the emission limitation.

<sup>15</sup> This statement is sufficient because the conveyor oven is designed to only burn natural gas and/or propane.

3. P09, Stack S09 - Six screening lines with 2 screening machines each and two screening lines with 1 screening machine for a total of 14 screening machines. Plus four additional backup screening machines for temporary replacement of the original 14 machines. Only 14 machines shall be operated at any one time. Process P09 includes 8 ovens. Six of these ovens fire natural gas or propane and have a total combined heat input rating of 7.9 mmBtus per hour. Two ovens are electric ovens. Installed 1991 and 2001. Modified 2005 and 2006. (Screening lines PSO-12-H, PSO-27-H, PSO-21-H, PSO-18-H, PSO-26-H, PSO-23-H, PSO-H-31, PSO-H-30)

POLLUTANT	(1). LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
a. Particulate Matter Emissions	(a) Emissions may not exceed 0.15 pounds per mmBtu heat input. [s. NR 415.06(2)(a), Wis. Adm. Code]	(b) The permittee shall only fire natural gas and/or propane in each of the drying ovens that are not powered by electricity. <sup>16</sup> [ss. NR 407.09(1)(c)1.b., Wis. Adm. Code and 285.65(3) and 285.63(1)(a), Wis. Stats.]	(a) <u>Reference Test Method for Particulate Matter Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 5 and Method 202 shall be used to demonstrate compliance. [s. NR 439.06(1), Wis. Adm. Code]  (b) The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility.. <sup>17</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]
b. Visible Emissions	(a) Emissions may not exceed 20% opacity [s. NR 431.05, Wis. Adm. Code]	(a) The permittee shall only fire natural gas and/or propane in each of the drying ovens that are not powered by electricity. <sup>18</sup> [ss. 285.65(3) and 285.63(1)(a), Wis. Stats.]	(a) <u>Reference Test Method for Visible Emissions:</u> Whenever compliance emission testing is required, US EPA Method 9 shall be used to demonstrate compliance. [s. NR 439.06(9)(a)1., Wis. Adm. Code]  (b) The permittee shall retain on site, a statement indicating that natural gas and propane are the only fuels available for combustion at the facility.. <sup>19</sup> [s. NR 439.04(1)(d), Wis. Adm. Code]

<sup>16</sup> Because the maximum theoretical emissions while firing these fuels are less than the allowable limit of 0.15 pounds per million Btu heat input, limiting the type of fuel used is adequate to demonstrate compliance with the particulate matter emission limit. Maximum theoretical particulate matter emissions were calculated using an emission factor of 7.6 pounds per million cubic feet of natural gas fired from AP-42, 5th edition, ch. 1.4.

<sup>17</sup> This statement is sufficient because each non-electric drying oven is designed to only burn natural gas and/or propane.

<sup>18</sup> It is not expected that the visible emission limitation of 20% opacity would be exceeded while firing these fuels. Therefore restricting the type of fuel used is adequate to ensure compliance with the emission limitation.

<sup>19</sup> This statement is sufficient because each non-electric drying oven is designed to only burn natural gas and/or propane.

3. P09, Stack S09 - Screening Lines - (Continued)

POLLUTANT	(1). LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p><b>c.</b> Volatile Organic Compounds</p>	<p><b>(a)</b> <u>Latest Available Control Techniques:</u> The permittee may not use coatings or inks with a VOC content greater than 7.3 pounds per gallon as applied. [s. NR 424.03(2)(c), Wis. Adm. Code and 06-MEC-044]</p>	<p><b>(a)</b> The permittee shall maintain the records required by I.B.3.c.(3)(c) to demonstrate compliance with I.B.3.c.(1)(a). [s. NR 407.09(4), Wis. Adm. Code]</p>	<p><b>(a)</b> <u>Reference Test Method for Volatile Organic Compound Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p><b>(b)</b> <u>Reference Test Method for Volatile Organic Compound Content:</u> Whenever compliance testing is required, U.S. EPA Method 24 shall be used to demonstrate compliance with the VOC content limitations. [s. NR 439.06(3)(b), Wis. Adm. Code]</p> <p><b>(c)</b> The permittee shall keep the following records for each ink and other VOC containing materials used on the screening lines:                      (i) A unique name of identification number for each ink and other VOC containing material, as applied; and                      (ii) The VOC content of each ink and other VOC containing material, as applied, in pounds per gallon. [s. NR 439.04(1)(d), Wis. Adm. Code.]</p> <p><b>(d)</b> The permittee shall use U.S. EPA Method 24, or coating manufacturer's formulation data to determine the VOC content of the of the inks used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

4. P36, Stack S36 - Towel Dryer - Installed 1991

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p><b>a.</b> Volatile Organic Compounds</p>	<p><b>(a)</b> No person may cause, allow or permit organic compound emissions into the ambient air which substantially contribute to the exceeding of an air standard or cause air pollution. [s. NR 419.03(1), Wis. Adm. Code]</p> <p><b>(b)</b> No person may cause, allow or permit organic compounds to be used or handled without using good operating practices and taking reasonable precautions to prevent the spillage, escape or emission of organic compounds, solvents or mixtures. [s. NR 419.03(2), Wis. Adm. Code]</p> <p><b>(c)</b> No person may cause, allow or permit the disposal of more than 1.5 gallons of any liquid VOC waste, or of any liquid, semisolid or solid waste materials containing more than 1.5 gallons of any VOC, in any one day from a facility in a manner that would permit their evaporation into the ambient air during the ozone season, except as provided for in s. NR 419.07. [s. NR 419.04(1), Wis. Adm. Code]</p> <p><b>(d)</b> Disposal during the ozone season shall be by methods approved by the department, such as incineration, recovery for reuse, or transfer in closed containers to an acceptable disposal facility, such that the quantity of VOC which evaporates into the ambient air does not exceed 15% (by weight) or 1.5 gallons in any one day, whichever is larger. [s. NR 419.04(2), Wis. Adm. Code]</p>	<p><b>(a)</b> The permittee shall maintain the records required by I.B.4.a.(3)(b) to demonstrate compliance with I.B.4.a.(1). [s. NR 407.09(4), Wis. Adm. Code]</p>	<p><b>(a)</b> <u>Reference Test Method for Volatile Organic Compound Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p><b>(b)</b> For each batch of towels dried the permittee shall keep records of (i) the weight of the towels before drying; (ii) the weight of the towels after drying; and (iii) the calculated amount of VOCs that are emitted from the towel dryer. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

5. P50, Stack S50 - Two Digital Printing Lines Each with an IR Curing Oven - Installed 2001

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p>a. Volatile Organic Compounds</p>	<p>(a) <u>Latest Available Control Techniques</u>: The permittee may not use coatings or inks with a VOC content greater than 5.4 pounds per gallon as applied. [s. NR 424.03(2)(c), Wis. Adm. Code]</p>	<p>(a) The permittee shall maintain the records required by I.B.5.a.(3)(c) to demonstrate compliance with I.B.5.a.(1)(a). [s. NR 407.09(4), Wis. Adm. Code]</p>	<p>(a) <u>Reference Test Method for Volatile Organic Compound Emissions</u>: Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p>(b) <u>Reference Test Method for Volatile Organic Compound Content</u>: Whenever compliance testing is required, U.S. EPA Method 24 shall be used to demonstrate compliance with the VOC content limitations. [s. NR 439.06(3)(b), Wis. Adm. Code]</p> <p>(c) The permittee shall keep the following records for each coating and other VOC containing materials used on the coater:                      (i) A unique name of identification number for each coating and other VOC containing material, as applied; and                      (ii) The VOC content of each coating and other VOC containing material, as applied, in pounds per gallon. [s. NR 439.04(1)(d), Wis. Adm. Code.]</p> <p>(d) The permittee shall use U.S. EPA Method 24, or coating manufacturer's formulation data to determine the VOC content of the of the inks used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

**6. P40, Stack S40 - Screen Cleaning Machine - Installed 1998**

Because the facility is not located in brown, Calumet, Dane, Dodge, Door, Fond du Lac, Jefferson, Kenosha, Kewaunee, Manitowoc, Milwaukee, Outagamie, Ozaukee, Racine, Rock, Sheboygan, Washington or Waukesha counties, because the screen cleaning machine is a cold cleaner, and because not more than 1.5 gallons of solvent are added per day, it is exempt from the requirements of s. NR 423.03, Wis. Adm. Code, pursuant to s. NR 423.03(2)(a), Wis. Adm. Code. Therefore the screen cleaning machine is subject to the general emission limitations for volatile organic compounds outlined in ss. NR 415.03 and NR 419.04, Wis. Adm. Code which are included in Part II of this operation permit.

**7. P14, Stack S14 - Miscellaneous Facility Wide Cleanup**

Because cleanup is performed using a wipe cleaning operation and the facility is located outside of Kenosha, Kewaunee, Manitowoc, Milwaukee, Ozaukee, Racine, Sheboygan, Washington or Waukesha counties, it is exempt from the requirements of s. NR 423.03, Wis. Adm. Code, pursuant to s. NR 423.03(2)(g)1., Wis. Adm. Code. The cleanup solvent use is subject to general emission limitations for volatile organic compounds outlined in ss. NR 419.03 and NR 419.04, Wis. Adm. Code which are included in Part II of this operation permit.

8. P60, Stack S60 - Screening machine with a natural gas oven with attached UV curing unit. The heat input rating of the natural gas oven is 0.78 mmBtus per hour. Installed 2002

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p>a. Volatile Organic Compounds</p>	<p>(a) <u>Latest Available Control Techniques</u>: The permittee may not use materials with VOC contents greater than those listed below:            (i) The VOC content of inks used may not be greater than 0.3 pounds per gallon as applied;            (ii) The VOC content of adhesives used may not be greater than 0 pounds per gallon as applied; and            [s. NR 424.03(2)(c), Wis. Adm. Code]</p>	<p>(a) The permittee shall maintain the records required by I.B.8.c.(3)(c) to demonstrate compliance with I.B.8.c.(1)(a). [s. NR 407.09(4), Wis. Adm. Code]</p>	<p>(a) <u>Reference Test Method for Volatile Organic Compound Emissions</u>: Whenever compliance emission testing is required, US EPA Methods 18, 25, 25A or 25B shall be used to demonstrate compliance. [ss. NR 439.06(3)(a) and NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p>(b) <u>Reference Test Method for Volatile Organic Compound Content</u>: Whenever compliance testing is required, U.S. EPA Method 24 shall be used to demonstrate compliance with the VOC content limitations. [s. NR 439.06(3)(b), Wis. Adm. Code]</p> <p>(c) The permittee shall keep the following records for each ink and other VOC containing materials used on P60:            (a) A unique name or identification number for each ink, adhesive, and other VOC containing material, as applied; and            (b) The VOC content of each ink, adhesive and other VOC containing material, as applied, in pounds per gallon. [s. NR 439.04(1)(d), Wis. Adm. Code.]</p> <p>(d) The permittee shall use U.S. EPA Method 24, or manufacturer's formulation data to determine the VOC content of the inks, adhesives, and solvents used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

**9. Process B10, Stack S10 - Natural Gas/Propane Space Heaters with a Total Rating of 10 mmBtu/hr**

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
a. Particulate Matter Emissions	(a) Emissions from each space heater with a maximum heat input more than one million Btu per hour may not exceed 0.15 pounds per million Btu heat input. <sup>33</sup> [s. NR 415.06(2)(a), Wis. Adm. Code]	(a) The permittee shall only fire natural gas and/or propane in the space heaters. <sup>34</sup> [ss. NR 407.09(1)(c)1.b., Wis. Adm. Code and 285.65(3) and 285.63(1)(a), Wis. Stats.]	(a) <u>Reference Test Method for Particulate Matter Emissions:</u> Whenever compliance emission testing is required, US EPA Methods 5 and Method 202 shall be used to demonstrate compliance. [s. NR 439.06(1), Wis. Adm. Code]  (b) The permittee shall retain on site a statement indicating that natural gas and propane are the only fuels available for combustion at the facility. [s. NR 439.04(1)(d), Wis. Adm. Code]
b. Visible Emissions	(a) 20% opacity [s. NR 431.05, Wis. Adm. Code]	(a) The permittee shall only fire natural gas and/or propane in the space heaters. <sup>36</sup> [ss. 285.65(3) and 285.63(1)(a), Wis. Stats.]	(a) <u>Reference Test Method for Visible Emissions:</u> Whenever compliance emission testing is required, US EPA Method 9 shall be used to demonstrate compliance. [s. NR 439.06(9)(a)1., Wis. Adm. Code]  (b) The permittee shall retain on site a statement indicating that natural gas and propane are the only fuels available for combustion at the facility.. [s. NR 439.04(1)(d), Wis. Adm. Code]

<sup>33</sup> Note: s. NR 415.06, Wis. Adm. Code applies only to fuel burning installations with a maximum heat input of more than one million Btus per hour.

<sup>34</sup> Because the maximum theoretical emissions while firing these fuels are less than the allowable limit of 0.15 pounds per million Btu heat input, limiting the type of fuel used is adequate to demonstrate compliance with the particulate matter emission limit. Maximum theoretical particulate matter emissions were calculated using an emission factor of 7.6 pounds per million cubic feet of natural gas fired from AP-42, 5th edition, ch. 1.4.

<sup>36</sup> It is not expected that the visible emission limitation of 20% opacity would be exceeded while firing these fuels. Therefore restricting the type of fuel used is adequate to ensure compliance with the emission limitation.

**10. Synthetic Minor Conditions Applicable to the Entire Facility**

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p><b>a. Volatile Organic Compounds</b></p> <p><i>Continued on Next Page...</i></p>	<p><b>(a)</b> Volatile organic compound emissions from the entire facility may not exceed 8.21 tons per month averaged over each 12 consecutive month period. [s. 285.65(7), Wis. Stats.]</p>	<p><b>(a)</b> Each calendar month the permittee shall calculate the total volatile organic compound emissions from the facility as follows. This calculation shall be performed within fifteen calendar days of the end of each month. [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p> $E_{\text{monthly}} = (1 \text{ ton}/2000 \text{ lbs}) \times \{[(U_1 \times W_1 \times C_1 \times G_1) + (U_2 \times W_2 \times C_2 \times G_2) + \dots + (U_n \times W_n \times C_n \times G_n)] - [(S_1 \times P_1) + (S_2 \times P_2) + \dots + (S_m \times P_m)]\}$ <p>where:  <math>E_{\text{monthly}}</math> is the monthly VOC emissions (tons/month);            U is the monthly usage of each ink, coating, solvent, or other VOC containing material used during the month (gallons/month);            W is the density of each ink, coating, solvent, or other VOC containing material used during the month (pounds/gallon);            C is the VOC content of each ink, coating, solvent, or other VOC containing material used during the month expressed as a weight fraction (i.e. if a material is 25% VOC by weight C would be 0.25);            G is a multiplier for VOC containing materials for which the VOC is emitted at other than 100% of its content;            n identifies each ink, coating, solvent or other VOC containing material used during the month;            S is the amount of each spent ink, coating, solvent or other VOC containing material recovered each month and shipped off site (gallons/month);            P is the VOC content of each spent ink, coating, solvent or other VOC containing material recovered each month and shipped off site in pounds per gallon;            m identifies each spent ink, coating, solvent or other VOC containing material recovered each month and shipped off site.</p>	<p><b>(a)</b> The permittee shall keep monthly records of the following:</p> <ul style="list-style-type: none"> <li>(i) A unique name or identification number for each ink, coating, solvent, or other VOC containing material used at the facility;</li> <li>(ii) The VOC content, expressed as a weight fraction (<math>C_n</math>) of each ink, coating, solvent, or other VOC containing material used at the facility;</li> <li>(iii) The amount of each ink, coating, solvent, or other VOC containing material used in gallons per month (<math>U_n</math>);</li> <li>(iv) The density of each ink, coating, solvent, or other VOC containing material used in pounds per gallon (<math>W_n</math>);</li> <li>(v) The G multiplier factor for the VOC in the material (<math>G_n</math>), including adequate documentation to show the derivation and appropriateness of the multiplier factor;</li> <li>(vi) The amount of spent ink, coating, solvent, or other VOC containing material recovered each month and shipped off site in gallons per month (<math>S_m</math>);</li> <li>(vii) The VOC content of each spent ink, coating, solvent or other VOC containing material recovered each month and shipped off site in pounds per gallon (<math>P_m</math>);</li> <li>(viii) The total monthly VOC emissions from the facility in tons per month as calculated in I.B.10.a.(2)(a), (<math>E_{\text{monthly}}</math>); and</li> <li>(ix) The total amount of VOC emitted from the facility averaged over each 12 consecutive month period in tons per month as calculated in I.B.10.a.(2)(b). [s. NR 439.04(1)(d), Wis. Adm. Code]</li> </ul>

**10. Synthetic Minor Conditions Applicable to the Entire Facility - Continued**

<b>POLLUTANT</b>	<b>(1) LIMITATIONS</b>	<b>(2) COMPLIANCE DEMONSTRATION METHODS</b>	<b>(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS</b>
<p><b>a. Volatile Organic Compounds - (Continued)</b></p>		<p><b>(b)</b> To demonstrate compliance with condition I.B.10.a.(1)(a), the permittee shall calculate the total tons of volatile organic compound emissions from the facility, averaged over each 12 consecutive month period by dividing the total monthly volatile organic compound emissions as calculated in I.B.10.b.(2)(a) for each 12 consecutive month period by 12. This calculation shall be performed within fifteen calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p>	<p><b>(b)</b> The permittee shall use U.S. EPA Method 24, or coating manufacturer's formulation data to determine the VOC content (<math>C_n</math>) and the density (<math>W_n</math>) of the of the inks, coatings, solvents or other VOC containing materials used. In case of an inconsistency between the Method 24 results and the formulation data, the Method 24 results will govern. [s. NR 439.04(1)(d), Wis. Adm. Code]</p> <p><b>(c)</b> The permittee shall analyze the spent ink, coating, solvent and other VOC containing material recovered and shipped off site to determine the VOC content (P) no less than: (i) each time there is a substantial change to materials or process operations that may affect the characteristics of the waste stream; or (ii) quarterly, which ever is most frequent. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

10. Synthetic Minor Conditions Applicable to the Entire Facility - Continued

POLLUTANT	(1) LIMITS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p><b>b. Hazardous Air Pollutants Regulated by the Clean Air Act</b></p> <p><i>Continued on Next Page...</i></p>	<p><b>(a)</b> The permittee may not emit any single hazardous air pollutant regulated by the Clean Air Act at a rate greater than 0.83 tons per month averaged over each 12 consecutive month period. [s. 285.65.(7), Wis. Stats.]</p> <p><b>(b)</b> The permittee may not emit a total of all hazardous air pollutants regulated by the Clean Air Act combined at a rate greater than 2.08 tons per month averaged over each 12 consecutive month period. [s. 285.65.(7), Wis. Stats.]</p>	<p><b>(a)</b> Each calendar month the permittee shall calculate the total facility emissions of <u>each hazardous air pollutant</u> regulated by the Clean Air Act as follows. This calculation shall be performed within fifteen calendar days of the end of each month.<sup>20</sup></p> $E_x = (1 \text{ ton}/2000 \text{ lbs}) \times \{[(U_1 \times W_1 \times H_1 \times F_1) + (U_2 \times W_2 \times H_2 \times F_2) + \dots + (U_n \times W_n \times H_n \times F_n)] - [(S_1 \times I_1) + (S_2 \times I_2) + \dots + (S_m \times I_m)]\}$ <p>where:            E<sub>x</sub> is the monthly emissions of each hazardous air pollutant regulated by the Clean Air Act (tons/month);            x identifies each HAP emitted from the facility            U is the monthly usage of each ink, coating, solvent, or other HAP containing material used during the month (gallons/month);            W is the density of each ink, coating, solvent, or other HAP containing material used during the month (pounds/gallon);            H is the HAP content of each ink, coating, solvent, or other HAP containing material used during the month expressed as a weight fraction (i.e. if a material is 25% HAP by weight H would be 0.25);            F is a multiplier for HAP containing materials for which the HAP is emitted at other than 100% of its content;            n identifies each ink, coating, solvent or other HAP containing material used during the month;            S is the amount of each spent ink, coating, solvent or other HAP containing material recovered each month and shipped off site (gallons/month);            I is the HAP content of each spent ink, coating, solvent or other HAP containing material recovered each month and shipped off site in pounds per gallon;            m identifies each spent ink, coating, solvent or other HAP containing material recovered each month and shipped off site.            [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p>	<p><b>(a)</b> The permittee shall keep monthly records of the following:            (i) A unique name or identification number for each ink, coating, solvent, or other HAP containing material used at the facility;            (ii) The weight fraction of each HAP contained in the material (H<sub>n</sub>) of each ink, coating, solvent, or other HAP containing material used at the facility;            (iii) The amount of each ink, coating, solvent, or other HAP containing material used in gallons per month (U<sub>n</sub>);            (vi) The density of each ink, coating, solvent, or other HAP containing material used in pounds per gallon (W<sub>n</sub>);            (v) The F multiplier factor for the HAP in the material (F<sub>n</sub>), including adequate documentation to show the derivation and appropriateness of the multiplier factor;            (vi) The amount of spent ink, coating, solvent, or other HAP containing material recovered each month and shipped off site in gallons per month (S<sub>m</sub>);            (vii) The amount of each HAP contained in each spent ink, coating, solvent or other HAP containing material recovered each month and shipped off site in pounds per gallon (I<sub>m</sub>);            (viii) The facility total monthly emissions of each HAP in tons per month as calculated in I.B.10.b.(2)(a), (E<sub>x</sub>);            (ix) The total amount of each HAP emitted from the facility averaged over each 12 consecutive month period in tons per month as calculated in I.B.10.b.(2)(b);            (x) The total monthly HAP emissions from the facility in tons per month (E<sub>hap</sub>), as calculated in I.B.10.b.(2)(c);            (xi) The total amount of all HAPs combined emitted from the facility averaged over each 12 consecutive month period in tons per month as calculated in I.B.10.b.(2)(d).            [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

<sup>20</sup> This calculation shall be performed for each hazardous air pollutant regulated by the Clean Air Act that is emitted from the facility.

10. Synthetic Minor Conditions Applicable to the Entire Facility - Continued

POLLUTANT	(1) LIMITATIONS	(2) COMPLIANCE DEMONSTRATION METHODS	(3) REFERENCE TEST METHODS, RECORDKEEPING, AND MONITORING REQUIREMENTS
<p><b>b. Hazardous Air Pollutants Regulated by the Clean Air Act - (Continued)</b></p>		<p><b>(b)</b> To demonstrate compliance with condition I.B.10.b.(1)(a), the permittee shall calculate the emissions of <u>each</u> hazardous air pollutant regulated by the Clean Air Act, averaged over each 12 consecutive month period by dividing the total monthly emissions of each hazardous air pollutant regulated by the Clean Air Act as calculated in I.B.10.b.(2)(a) for each 12 consecutive month period by 12. This calculation shall be performed within fifteen calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p><b>(c)</b> Each calendar month the permittee shall calculate the <u>total</u> emissions of hazardous air pollutants regulated by the Clean Air Act as follows. This calculation shall be performed within fifteen calendar days of the end of each month.</p> $E_{\text{hap}} = \sum E_x$ <p>where:  <math>E_{\text{hap}}</math> is the monthly total emissions of all hazardous air pollutants regulated by the Clean Air Act that are emitted by the facility (tons/month);  <math>E_x</math> is the monthly emissions of each hazardous air pollutant regulated by the Clean Air Act (tons/month) as calculated in I.B.10.b.(1)(a);  x identifies each HAP emitted from the facility.  [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p> <p><b>(d)</b> To demonstrate compliance with condition I.B.10.b.(1)(b), the permittee shall calculate the total emissions of <u>all</u> hazardous air pollutants regulated by the Clean Air Act, averaged over each 12 consecutive month period by dividing the total monthly emissions of all hazardous air pollutants regulated by the Clean Air Act as calculated in I.B.10.b.(2)(c) for each 12 consecutive month period by 12. This calculation shall be performed within fifteen calendar days of the end of each month for the previous 12 consecutive month period. [s. NR 407.09(4)(a)1., Wis. Adm. Code]</p>	<p><b>(b)</b> The permittee shall use coating manufacturer's formulation data to determine the HAP content (<math>H_n</math>) of the of the inks, coatings, solvents or other HAP containing materials used. [s. NR 439.04(1)(d), Wis. Adm. Code]</p> <p><b>(c)</b> The permittee shall analyze the spent ink, coating, solvent and other HAP containing material recovered and shipped off site to determine the HAP content (H) no less than:  (i) each time there is a substantial change to materials or process operations that may affect the characteristics of the waste stream; or (ii) quarterly, which ever is most frequent. [s. NR 439.04(1)(d), Wis. Adm. Code]</p>

**11. Conditions Applicable to the Entire Facility**

<b>CONDITION TYPE</b>	<b>(1). CONDITIONS</b>
<b>a. Reporting</b>	<p><b>(a)</b> Submit the results of monitoring or a summary of monitoring results required by Part I.B. of this permit to the Department annually.</p> <p>(i) The time period to be addressed by the submittal are: January 1 to December 31.</p> <p>(ii) The report shall be submitted to the Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI 54601, phone (608) 785-9000 within 30 days after the end of each reporting period.</p> <p>(iii) All deviations from and violations of applicable requirements shall be clearly identified in the submittal.</p> <p>(iv) Each submittal shall be certified by a responsible official as to the truth, accuracy and completeness of the report. [s. NR 439.03(1)(b), Wis. Adm. Code]</p> <p><b>(b)</b> Submit a certification of compliance with the requirements of Part I.B. of this permit to the Department annually.</p> <p>(i) The time period to be addressed by the report is the January 1 to December 31 period which precedes the report.</p> <p>(ii) The report shall be submitted to the Wisconsin Department of Natural Resources, La Crosse Area Office, 3550 Mormon Coulee Road, Room 104, La Crosse, WI 54601, phone (608) 785-9000 within 30 days after the end of each reporting period.</p> <p>(iii) The information included in the report shall comply with the requirements of Part II Section N of this permit.</p> <p>(iv) Each report shall be certified by a responsible official as to the truth, accuracy and completeness of the report. [s. NR 439.03(1)(c), Wis. Adm. Code]</p>
<b>b. Compliance Testing</b>	<p><b>(a)</b> Whenever compliance emission tests are required by the Department:</p> <p>(i) Any compliance emission tests required by the Department shall be conducted while operating at 100% capacity. If operation at 100% capacity is not feasible, the sources shall operate at a capacity which is approved by the Department in writing.</p> <p>(ii) The reference test methods outlined in this permit shall be used unless an alternate, U.S. EPA approved, test method is approved by the Department in writing.</p> <p>(iii) The Department shall be informed at least 20 working days prior to any tests so a Department representative can witness the testing.</p> <p>(iv) At the time of notification, a compliance test plan shall also be submitted for approval.</p> <p>(v) Two copies of the report on any required tests shall be submitted to the Department for evaluation within 60 days after the tests. [s. NR 439.07, Wis. Adm. Code]</p>
<b>c. Construction Permit Requirements</b>	<p><b>(a)</b> Construction Permit Expiration: Construction permit 06-MEC-044 expires August 2, 2007. Construction or modification and an initial operation period for equipment shakedown, testing and Department evaluation of operation to assure conformity with the permit conditions is authorized for each emissions unit covered in this permit. Please note that the sources covered by this permit are required to meet all emission limits and conditions contained in the permit at all times, including during the initial operation period. If 18 months is an insufficient time period for construction or modification, equipment shakedown, testing and Department evaluation of operation, the permit holder may request and the Department may approve in writing an extension of this permit. [ss. 285.60(1)(a)2 and 285.66(1), Wis. Stats.; s. NR 406.12, Wis. Adm. Code and 06-MEC-044]</p>