



March 17, 2023

Electronic Submittal – Kentucky Business One Stop

Kentucky Division for Air Quality
Attn: Permit Support Section
300 Sower Boulevard
Frankfort, KY 40601

Subject: 3M Cynthiana Title V Operating Permit Renewal - Permit ID: V-18-009
KY EIS (AFS) #: 21-097-00021
Agency Interest (AI) ID: 1752

Dear Document Coordinator:

Enclosed are three copies of the Title V permit renewal application for the 3M Cynthiana facility located at 1309 New Lair Road in Cynthiana, KY, as required by 401 KAR 52:020, Section 5. In accordance with 401 KAR 52:020, Section 12, Item (4), an application for a permit renewal is required to be submitted no later than six months prior to the expiration of the current Title V permit (#V-18-009), which was issued on September 22, 2018 and expires on September 22, 2023. As required by Kentucky rules, this application is being submitted prior to March 22, 2023, six months prior to expiration.

Only information that is new or different from the information in the facility's current Title V is required to be included in the permit renewal application, pursuant to 401 KAR 52:020, Section 4, Item (2)(c). Since the issuance of the facility's current Title V permit, 3M Cynthiana has made numerous modifications classifiable as insignificant or trivial activities. Additionally, prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's current Title V permit were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities. These changes are noted on the enclosed DEP7007DD, DEP7007N, and DEP7007V forms.

A redline version of the current Title V permit is included to illustrate these requested changes, as well as updating requirements for units that have been decommissioned and revising permit language to incorporate updates made to referenced federal regulatory requirements.

If you have any questions or comments, please contact me at (651)-788-2580 or via email at rnavis@mmm.com.

Sincerely,

A handwritten signature in black ink, appearing to read 'Ryan Navis'.

Ryan Navis
Senior Environmental Engineer

Division for Air Quality

300 Sower Boulevard
Frankfort, KY 40601
(502) 564-3999

DEP7007AI

Administrative Information

- ___ Section AI.1: Source Information
- ___ Section AI.2: Applicant Information
- ___ Section AI.3: Owner Information
- ___ Section AI.4: Type of Application
- ___ Section AI.5: Other Required Information
- ___ Section AI.6: Signature Block
- ___ Section AI.7: Notes, Comments, and Explanations

Additional Documentation

___ Additional Documentation attached

Source Name: 3M Cynthiana

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

Section AI.1: Source Information

Physical Location Street: 1309 New Lair Road

Address: City: Cynthiana County: Harrison Zip Code: 41031

Street or P.O. Box: 3M Center, Building 225-01-N-22

Mailing Address: City: St. Paul State: MN Zip Code: 55144-1000

Standard Coordinates for Source Physical Location

Longitude: 84.294722 (decimal degrees)

Latitude: 38.375 (decimal degrees)

Primary (NAICS) Category: Stationary Product Manufacturing

Primary NAICS #: 322230

Classification (SIC) Category:	Stationary Products	Primary SIC #:	2678
Briefly discuss the type of business conducted at this site: Facility manufactures and coats pressure sensitive adhesives to make tapes and note pads.			
Description of Area Surrounding Source:	<input type="checkbox"/> Rural Area <input checked="" type="checkbox"/> Urban Area	<input type="checkbox"/> Industrial Park <input checked="" type="checkbox"/> Industrial Area	<input type="checkbox"/> Residential Area <input type="checkbox"/> Commercial Area
Approximate distance to nearest residence or commercial property:	500 ft	Property Area:	51.38 acres
		Is any part of the source located on federal land?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
		Number of Employees:	360
		Is this source portable?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
What other environmental permits or registrations does this source currently hold or need to obtain in Kentucky?			
NPDES/KPDES:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
Solid Waste:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
RCRA:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
UST:	<input type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input checked="" type="checkbox"/> N/A
Type of Regulated Waste Activity:	<input type="checkbox"/> Mixed Waste Generator <input type="checkbox"/> U.S. Importer of Hazardous Waste	<input checked="" type="checkbox"/> Generator <input type="checkbox"/> Transporter	<input type="checkbox"/> Recycler <input type="checkbox"/> Treatment/Storage/Disposal Facility <input type="checkbox"/> Other: _____ <input type="checkbox"/> N/A

Section AL.2: Applicant Information

Applicant Name: 3M Company

Title: (if individual) N/A

Mailing Address: Street or P.O. Box:

City: State: Zip Code:

Email: (if individual)

Phone:

Technical Contact

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22

City: St. Paul State: MN Zip Code: 55144-1000

Email: mavis@mmm.com

Phone: (651)-788-2580

Air Permit Contact for Source

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22

City: St. Paul State: MN Zip Code: 55144-1000

Email: mavis@mmm.com

Phone: (651)-788-2580

Section AI.3: Owner Information

Owner same as applicant

Name:

Title:

Mailing Address:

Street or P.O. Box:

City:

State:

Zip Code:

Email:

Phone:

List names of owners and officers of the company who have an interest in the company of 5% or more.

Name

Position

For a list of current 3M Corporate Officers, please visit this webpage:

<http://investors.3m.com/governance/corporate-officers/default.aspx>

Section AI.4: Type of Application

Current Status: Title V Conditional Major State-Origin General Permit Registration None

Name Change Initial Registration Significant Revision Administrative Permit Amendment

Renewal Permit Revised Registration Minor Revision Initial Source-wide Operating Permit

502(b)(10)Change Extension Request Addition of New Facility Portable Plant Relocation Notice

Revision Off Permit Change Landfill Alternate Compliance Submittal Modification of Existing Facilities

Ownership Change Closure

Requested Status: Title V Conditional Major State-Origin PSD NSR Other: _____

Is the source requesting a limitation of potential emissions?

Pollutant:	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Requested Limit:	Requested Limit:
<input type="checkbox"/> Particulate Matter		<input type="checkbox"/> Single HAP	_____
<input type="checkbox"/> Volatile Organic Compounds (VOC)		<input type="checkbox"/> Combined HAPs	_____
<input type="checkbox"/> Carbon Monoxide		<input type="checkbox"/> Air Toxics (40 CFR 68, Subpart F)	_____
<input type="checkbox"/> Nitrogen Oxides		<input type="checkbox"/> Carbon Dioxide	_____
<input type="checkbox"/> Sulfur Dioxide		<input type="checkbox"/> Greenhouse Gases (GHG)	_____
<input type="checkbox"/> Lead		<input type="checkbox"/> Other	_____

For New Construction:

Proposed Start Date of Construction: _____
(MM/YYYY)

Proposed Operation Start-Up Date: (MM/YYYY)

For Modifications:

Proposed Start Date of Modification: _____
(MM/YYYY)

Proposed Operation Start-Up Date: (MM/YYYY)

Applicant is seeking coverage under a permit shield. Yes No

Identify any non-applicable requirements for which permit shield is sought on a separate attachment to the application.

Section A1.5 Other Required Information

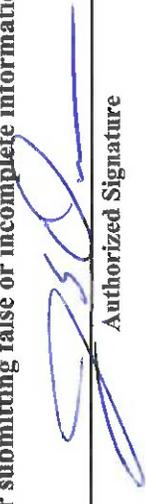
Indicate the documents attached as part of this application:

- DEP7007A Indirect Heat Exchangers and Turbines
- DEP7007B Manufacturing or Processing Operations
- DEP7007C Incinerators and Waste Burners
- DEP7007F Episode Standby Plan
- DEP7007J Volatile Liquid Storage
- DEP7007K Surface Coating or Printing Operations
- DEP7007L Mineral Processes
- DEP7007M Metal Cleaning Degreasers
- DEP7007N Source Emissions Profile
- DEP7007P Perchloroethylene Dry Cleaning Systems
- DEP7007R Emission Offset Credit
- DEP7007S Service Stations
- DEP7007T Metal Plating and Surface Treatment Operations
- DEP7007V Applicable Requirements and Compliance Activities
- DEP7007Y Good Engineering Practice and Stack Height Determination
- DEP7007AA Compliance Schedule for Non-complying Emission Units
- DEP7007BB Certified Progress Report

- DEP7007CC Compliance Certification
- DEP7007DD Insignificant Activities
- DEP7007EE Internal Combustion Engines
- DEP7007FF Secondary Aluminum Processing
- DEP7007GG Control Equipment
- DEP7007HH Haul Roads
- Confidentiality Claim
- Ownership Change Form
- Secretary of State Certificate
- Flowcharts or diagrams depicting process
- Digital Line Graphs (DLG) files of buildings, roads, etc.
- Site Map
- Map or drawing depicting location of facility
- Safety Data Sheet (SDS)
- Emergency Response Plan
- Other: _____

Section A1.6: Signature Block

I, the undersigned, hereby certify under penalty of law, that I am a responsible official*, and that I have personally examined, and am familiar with, the information submitted in this document and all its attachments. Based on my inquiry of those individuals with primary responsibility for obtaining the information, I certify that the information is on knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false or incomplete information, including the possibility of fine or imprisonment.


Authorized Signature

Jason Orr

Type or Printed Name of Signatory

3/17/2023

Date

Plant Director

Title of Signatory

*Responsible official as defined by 401 KAR 52:001.

Section AI.7: Notes, Comments, and Explanations

<p>Division for Air Quality</p> <p>300 Sower Boulevard Frankfort, KY 40601 (502) 564-3999</p>	<p>DEP7007B</p> <p>Manufacturing or Processing Operations</p> <p>___ Section B.1: Process Information ___ Section B.2: Materials and Fuel Information ___ Section B.3: Notes, Comments, and Explanations</p>	<p>Additional Documentation</p> <p>___ Complete DEP7007A1, DEP7007N, DEP7007V, and DEP7007GG. ___ Attach a flow diagram ___ Attach SDS</p>								
<p>Source Name: 3M Cynthiana</p>										
<p>KY EIS (AFS) #: 21-097-00021</p>										
<p>Permit #: V-18-009</p>										
<p>Agency Interest (AI) ID: 1752</p>										
<p>Date: 3/17/2023</p>										
<p>Section B.1: Process Information</p>										
Emission Unit #	Emission Unit Name	Describe Emission Unit	Process ID	Process Name	Manufacturer	Model No.	Proposed/Actual Date of Construction Commencement (MM/YYYY)	Is the Process Continuous or Batch?	Number of Batches per 24 Hours (if applicable)	Hours per Batch (if applicable)
EU 68	Corona Treater 1	Corona treater	15J	15J Polypropylene Extrusion Line	Sofral Corona & Plasma	Series 60300	06/2002	Continuous	N/A	N/A
EU 69	Corona Treater 2	Corona treater	15J	15J Polypropylene Extrusion Line	Sofral Corona & Plasma	Series 9000	03/2014	Continuous	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Fugitive emissions from coater cleaning	3R	3R	N/A	N/A	10/2001	Batch	See B.3 Item 4	See B.3 Item 4
EU 71	Equipment Leaks - Fugitive	Fugitive emissions from piping components	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	08/1985	Continuous	N/A	N/A

Section B.2: Materials and Fuel Information

**Maximum yearly fuel usage rate only applies if applicant request operating restrictions through federally enforceable limitations.*

Emission Unit #	Emission Unit Name	Name of Raw Materials Input	Maximum Quantity of Each Raw Material Input		Total Process Weight Rate for Emission Unit (tons/hr)	Name of Finished Materials	Maximum Quantity of Each Finished Material Output		Fuel Type	Maximum Fuel Usage Rate		Sulfur Content (%)	Ash Content (%)
			(Specify Units/hr)	(Specify Units/hr)			(Specify Units/hr)	(Specify Units)		(Specify Units)			
EU 68	Corona Treater 1	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive Equipment	Solvent (contains VOC, HAP)	0.41	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 71	Leaks - Fugitive	Solvent (contains VOC, HAP)	16.79	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A

Section B.3: Notes, Comments, and Explanations

<p>1. There are no control devices associated with the emission units listed in B.1, thus Form DEP7007 GG is not included in the permit application.</p>
<p>2. There are no new SDS associated with emission units listed in B.1.</p>
<p>3. There are no changes to the PFDs for the processes associated with the emission units listed in B.1.</p>
<p>4. The frequency of coater cleaning is variable depending on the types of coating material used and the duration of a product run.</p>
<p>5. Operation of the corona treaters and fugitive emissions from cleaning and equipment leaks do not directly correlate to a process weight or finished materials. These units by themselves do not manufacture a product, they are part of existing permitted process lines at the facility. For additional details on the processes the units are associated with and their emissions, see the DEP7007N Source Emissions Profile form included with this application.</p>

Division for Air Quality Submit to the Regional Office identified in your permit

DEP7007CC Compliance Certification Section CC.1: Source Information Section CC.2: Signature Block Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit Section CC.4: Notes, Comments, and Explanations

Section CC.1: Source Information

1) Source Name 3M Cynthia 2) Agency Interest (AID) ID 1752

3) Source Location Address (street, city, state, zip) 1308 New Lair Road

4) Technical Contact (name, e-mail, phone #) Bryan Schroers, bgschroers@mmn.com, 859-569-4238

5) Permit Number(s) V-19-009 6) County Harrison 7) KY EIS (AFS) # 21-097-00021

8) Submittal Information Are you certifying any requirement(s) as "not in continuous compliance?" Yes No What is the reporting period? 1 mm/ dd/ yy 1 2022 TO 12 mm/ dd/ yy 31 2022

Section CC.2: Signature Block

9) CERTIFICATION SIGNATURE

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE STATEMENTS AND INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.

BY: [Signature] AUTHORIZED SIGNATURE

3/17/2023 DATE

Jason Orr TYPED OR PRINTED NAME OF SIGNATORY Plant Director TITLE OF SIGNATORY

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units in Continuous Compliance

10a) Emission Units in Continuous Compliance. The following emission units were in continuous compliance with each permit term or condition(s) and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	Daily compliance with emission, standard of 0.05 lb. VOC emitted/lb. VOC input [95% overall control] Overall VOC control efficiency shall be at least 95% Monthly average	Lowest overall control over 12-month rolling period for 1R 1R has been decommissioned in 2021 Lowest overall control over 12-month rolling period for 2R was 99.53% (2022). Lowest monthly avg. for 2R was 99.53% (2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on 2R thermal oxidizer 8/12/2018 -Testing: Performance Test on 1R RTO 8/11/2018 -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	daily compliance with emission, standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period for 1R 1R has been decommissioned in 2021 Overall Control over 12-month period for 2R was 99.53%. Lowest daily overall control average on 2R was 99.53%	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs. -Not applicable to waterbase primer and tinters which are not controlled.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	VOC emissions < or = to 278.1 lb./hr. and 1218.0 tons/yr.;	1R has been decommissioned in 2021 Emission for this reporting period = .82lb/hr. average, .89lb/hr. max. monthly avg. (6/2022) and 1.19 tons/yr. highest 12-month rolling (2/2022) with clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	Cleanup emissions < or = to 1.14 lb./hr. and 4.99 tons/yr.	Emissions for this reporting period = .08 lb./hr. average, .29lb/hr. max. monthly avg. (2/2022) and .136 ton/yr. rolling max(6/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (cleanup for 1R and 2R). 1R decommissioned in 2021
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of ctg. Solids applied monthly average	Emission for this reporting period = 1R decommissioned in 2021	Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. -Records maintained. -This compliance data was collected intermittently.
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	VOC emissions shall not exceed 47,946.4 lbs./month	Emission for this reporting period = 1R decommissioned in 2021	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R). 1R decommissioned in 2021

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#023-2R	Sec. B table 3 from permit V-18-007	2R Coating Line	For the collection of controlled applicators <0.05 lb VOC/lb of ctg. applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-008	2R Coating Line	For the collection of controlled applicators <0.04 lb VOC/lb of ctg. Matt's applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of controlled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average	Maximum monthly ratio = 0.02a4 kg VOC/kg (7/22). Average monthly ratio = .023 kg VOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of ctg. Solids applied monthly average	Emission for this reporting period = Maximum monthly ratio = 0.132 kg VOC/kg (10/22). Average monthly ratio .114 kgVOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	VOC emissions shall not exceed 37,485.5 lbs./month	Emission for this reporting period = 279.4 lb/month max (6/2022) or 196.1 lb./month avg.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (2R).
#011 -1R #023-2R	B.[WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtg].5.B.7.i.a	1R Coating Line and 2R Coating Lines combined	Record: mass of each ctg. material. used each day	Not applicable for this condition	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	Verify that ratio of VOC emissions to coating solids is less than or equal to .019 and overall control efficiency is at least 90%	VOC emissions to solids ratio applied = 0.0023 max. (7/2022) and .0022 average Demonstrated control efficiency is 98.33%.	Recordkeeping and testing: records maintained for manufacturer's formulation data, raw material usage, and calculation to verify ratio of VOC input to solids applied. Records and Testing compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	daily compliance with emission. standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period was 98.33%. Lowest monthly average 98.33%	-Record keeping: emission data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009 40 CFR Part 63 subpart JJJJ	3R Coating Line	Overall VOC control efficiency shall be at least 95% Monthly average	Overall Control over 12-month period was 98.33%.	-Record keeping: emission data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	VOC emissions < or = 51.5 tons per 12-month rolling total.	Emissions for the period. With clean-up solvents included: 12-month rolling total 12.3 tons/yr. 12-month roll max 16.9 tons/yr. (1/2022). 14.6 Tons/yr. 12-month roll avg.	Record keeping: Emission calculation records maintained. Data was collected intermittently.
#022 - 3R	B.[WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtg].5.B.7.i.a	3R Coating Line	Record: mass of each ctg. material. used each day	Not applicable for this condition	Directly from production reporting -PLC
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtg].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Overall VOC control efficiency shall not be less than 98% for the entire 4R Coater Line standard of 0.02 lb. VOC emitted/lb. VOC	Lowest overall control over 12-month rolling period for 4R was 99.11% (2/2022). Lowest monthly avg. 99.06% (8/2022)	-Record keeping: emission data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARS, and CGAs.
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtg].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Daily compliance with emission. standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	4R always controlled Except water-base primer coater -- which was declared BACT = "no control" - emissions from primer coater are included in the daily calc. Lowest daily overall control average on 4R was 98.67% (on 1/15/2022)	-Record keeping: emission data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARS, and CGAs.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	VOC emissions shall not exceed 329 tpy (12-month rolling total)	Emissions for the period: Total 23.76 tons/yr. 12-month roll max (8/2022). 12-month roll average 23.20 tons/yr. With clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	MEK cleanup usage (emitted) shall not exceed 620 gallons per year.	MEK cleanup solvent emissions, rolling gallons max = 0 gal (2022) during this period. Average rolling for year 0 gallons. no MEK usage for 4R in 2022	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	IPA cleanup usage (emitted) shall not exceed 360 gallons per year.	IPA cleanup solvent emissions, rolling gallons max = 82.5 gal (2/2022) during this period. Average rolling for the year = 70.81 gallons	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	B.[WebCtj].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtj].5.B.7.i.a	4R Coater Line - Precoat 1, Precoat 2, and Functional	Record: mass of each ctg. material. used each day	Not applicable for this condition	Directly from production reporting -PLC
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:016	5R Coating Line	Emissions not to exceed 0.14 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Maximum monthly ratio = 0.0289 kg VOC/kg (10/22). Average monthly ratio = .0283 kg VOC/kg	-Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:017	5R Coating Line	12-month rolling sum of emissions not to exceed 200 tons VOC.	12-month rolling emissions = 16.23 TPY max month (10/22) 15.67 TPY avg. for year 15.95 TPY for yr. end 2022	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	5R Coating Line	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR	Not Applicable	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use.
#050 - 5R	B. [WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B. [WebCtg].5.B.7.i.a	5R Coating Line	Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator Record: mass of each cty. material. used each day	427J Gray = 0.094lb. VOC/lb. solids Rule Line Blue = 0.135 lb. VOC/lb. solids Easel Ink = .131 lb. VOC/lb. solids per manufacture (3/28/2022).	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	6R	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR	This is done through production reporting to get the monthly totals.	Directly from production reporting -PLC
6R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	6R	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR	Not Applicable	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
6R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	6R	Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator	427J Gray = 0.094 lb. VOC/lb. solids Rule Line Blue = 0.135 lb. VOC/lb. solids per manufacture (3/28/2022)..	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.440	6R	Emissions not to exceed 0.05 lb VOC/lb VOC applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.441	6R	Emissions not to exceed 0.05 lb VOC/lb of coating materials applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.442	6R	Emissions not to exceed 0.20 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Total 2022 emissions Maximum monthly ratio = 0.0265 kg VOC/kg (11/22) Average monthly ratio = .0232 kg VOC/kg	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#011, #022, #023, #033	B.[WebCtg].1.B.1 B.[WebCtg].3.A; B.[WebCtg].3.B; B.[WebCtg].3.D; B.[WebCtg].4.B.1; B.[WebCtg].7.A; E.2.A.3	GP-C01 Thermal Oxidizers • RTO1 • TO1 • TO2	Performance Test for each oxidizer • Determine control effect. • ESTABLISH: op. limits [3-hr avg. T]	Latest Performance Testing completed in 9/12/2018 (TO2) 9/11/2018 (for RTO)	Testing: Performance Test on thermal oxidizer
Thermal Oxidizers • RTO1 • TO1 • TO2		Thermal Oxidizers	-Quarterly calibration of chart recorder, data logger, and thermocouples located in the combustion zone -Conducted a visual inspection of each thermocouple if redundant sensors are not used. - Validation check for new sensors.	Quarterly PM's completed for RTO, & TO2	TO1 decommissioned. Maintenance work order for annual replacement of all thermocouples. Maintenance work orders complete for quarterly calibration of thermocouples. Located in SAMS • Chart recorder is redundant to PLC archival • Data logger -- PLC -- is self-checking The compliance data is collected continuously, can be viewed thru 3M Cynthiana KQreports, and monthly environmental reports.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	Sec. B table 3 from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture Efficiency Monitoring with ΔP measurement, then:</p> <ul style="list-style-type: none"> • LOCATE: P-sensor's in or as close as possible to a position that provides a representative measurement of the P-drop across each opening monitored • Accuracy: more accurate of 0.5 in. H2O col. or 5% of true value • Perform: initial calibration of each sensor per manuf's specs. 	Quarterly PM's completed for 1R, 2R, 3R and 4R ovens	<p>Monitoring and record keeping: Pressure sensors installed, maintained, verified, and operated. Maintenance work orders complete for quarterly maintenance calibrations located in SAMs. The compliance data is collected continuously, can be viewed thru 3M Cynthia KQreports, and monthly environmental reports.</p>
1R,2R,3R,4R	Sec. B (5)(C), from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture System Monitoring Plan</p> <p>Site specific plan</p> <p>Identify the operating parameters and specific monitoring procedures.</p> <p>Make plan available</p> <p>Review plan annually</p>	Plan last reviewed 1/19/2023	Have a CSMP located on plant share drive and hard copy in 3M EHS office.
1R,4R	Sec. B (4)(A), Sec. E (3) (A) from permit V-18-009	Solvent Recovery Unit (SRU)	<p>Continuous recording of SRU organic concentration in inlet and outlet gas streams</p> <p>Conduct quarterly audits</p> <p>Must have valid data from at least 90% of the hours which the process is operated.</p>	<p>CMS downtime is noted on our quarterly S60.7 summary report which is submitted semi-annually. Have been above 95% for 2021</p>	<p>Monitoring and record keeping: CEMS installed, maintained, calibrated, and operated. The compliance data is collected continuously, and can be viewed thru 3M Proficy Portal, and monthly environmental report.</p> <p>Average less than limit would be flagged on monthly environmental reports. Valid data for $\geq 90\%$ of hrs. of coater operation</p>
1R,2R,3R,4R	Sec. B (5)(A), from permit V-18-009 63.10(b)(1)	Web Coating Lines	<p>Keep required records of information (including all reports and notifications) in a form suitable and readily available, retained for at least 5 years</p>	<p>Not applicable for this condition</p> <p>Follow record retention schedule of 10 years</p>	<p>Record keeping: maintenance records and performance evaluations kept. This compliance data is collected intermittently.</p>

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	Sec. B (5)(B). from permit V-18-009 63.447(b)	Web Coating Lines	Startup, Shutdown, & Malfunction Plan [SSM Plan] procedures for operating and maintaining the source during startup, shutdown, and malfunction • program of corrective action for malfunctioning process • air pollution control and monitoring equip. used to meet the standard	Plan last reviewed 3/30/2021	Have a SSM Plan located on plant share drive and hard copy in 3M EHS office. SSM Plan no longer required - On and after July 9, 2021 the affected coating operation(s) must be in compliance with the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(iv) 63.3320	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND: • response is NOT consistent with the SSM Plan, AND • EXCEED: ANY related emission. Limit Notify permit authority	Not applicable for this condition As of 7/9/2021 no longer require SSM Plan	Have a SSM plan, use excess emission/Malfunction Notification Form if needed (see below for any deviations listed this year) On and after July 9, 2021 the affected coating operation(s) must be in compliance with the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(viii)	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND is NOT adequately addressed by the SSM Plan REVISE: SSM Plan	Not applicable for this condition	On and after July 9, 2021 the affected coating operation(s) must be in compliance with the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	10(c)(7)	Web Coating Lines	RECORD: date, time (start/stop); each instance of excess emissions and parameter monitoring exceedances during: • startups, shutdowns, and malfunctions • all other periods	Not applicable for this condition	TO thermocouples and the enclosure P monitors: PLC identifies all periods of 3-hr avg. < set pt. --- may be set inside the limit, meaning effectively not possible to have a parameter monitoring exceedance. The compliance data is collected continuously, can be viewed thru 3M Cynthia KGregorys, and monthly environmental reports.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	40 CFR 63.3350(e)(6)	Web Coating Lines	For each CPMS used by each: • APCD • capture system • bypass line Maintain parts for routine repair	Not applicable for this condition CPMS plan last reviewed 11/11/2021	3M Standard practice to maintain spare parts critical systems Maintain a CPMS (Continuous Parameter Monitoring System Plan)
1R,2R,3R,4R	40 CFR 63.3400©	Web Coating Lines	Submit MACT JJJJ Semi-annual Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
Primer Mix Tank	40 CFR Part 63, Subpart HHHHH Requirements	Web Coating Lines	MACT HHHHH Primer Mix Tank. this subpart for each individual stationary process vessel at an existing source, the permittee may elect to comply with a 5 weight percent HAP limit for process vessels at the affected source that are used to manufacture coatings with a HAP content of less than 0.05 kg per kg product subpart.	Not applicable for this condition	Use the alternative to complying with Table 1 by complying with the 5 weight percent HAP limit based on the SDS information.
1R,2R,3R,4R	B.[WebCtg].5.B.6	Web Coating Lines	Applies to each instance: CMS malfunction or inoperative, Except: zero (low-level) and high-level checks Record - date & time	Not applicable for this condition	• TOs: thermocouples on each TO -- faults and shuts down coater if loss of signal. • SRU: CEMS -- if lose signal, alarm to operator • enclosures: » entire bay an enclosure: 1R, 2R, 4R, 5R -- ΔP oven vs. bay -- one mag. per oven zone -- lose any one signal, PLC shuts coater down » 3R -- dedicated coating enclosure -- ΔP enclosure vs. bay -- single mag. -- lose any signal, PLC shuts coater down Data archived by I historian database
1R,2R,3R,4R	B.6.B Includes: B.6.C	Web Coating Lines	Summit Quarterly VOC Exceedances Report [a] If: no exceedances during a quarter, then submit semiannually	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. Quarterly report if there is an exceedance. This compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	B.[WebC]g].6.A	Web Coating Lines	Submit semi-annual Excess Emissions and Monitoring Systems Performance Report.	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
HAP tanks and transfer racks (TR)	MACT EEEE Organic Liquids Distribution As Required by 40 CFR 63.2386	HAP tanks and transfer racks (TR)	Semiannual Compliance MACT EEEE Report. Submitted according to §63.2386 Organic Liquids Distribution.	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
1R,2R,3R4R, 5R, 6R PSB-1 PCT1 PCT2 PCT3	Sec. B (4)(A). from permit V-18-009	All sources covered by permit. Facility-wide	Report Source wide VOC and HAP emissions as part of the semiannual reporting	Max. Annual rolling VOCs emissions = 56.72 Tons (03/2022) Max. Annual rolling HAPs emissions = 5.95 Tons (04/2022) Average Annual rolling VOCs emissions = 54.78 Tons Average rolling HAPs emissions = 5.65 Tons	Reporting: Semiannual reports submitted by 7/30 and 1/30. This compliance data is collected intermittently. The permit fee shall include the monthly emissions from these facilities in the monthly emission totals for the respective coating lines"
15J	B.[15J].1 Includes: B.[15J].6 401 KAR 59:010	15J Polypropylene Line	Particulate filters shall be in place and functional at all times of operation. The filters shall be maintained and operated in accordance with the manufacturer's recommendations.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run
15J	B.[15J].2.1	15J Polypropylene Line	Each stack opacity: ≤ 20 % opacity Particulate limits = 2.34 lbs./hr. 2.61 lbs./hr. 5.69 lbs./hr.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run

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15J	401KAR 59:010 Section(3)	15J Polypropylene Line	Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack no less than weekly and maintaining a log of the observations.	Have a log for weekly opacity observation. Log maintained though 2022 Weekly visual opacity observations for 15J film line no weeks missing in 2022	Have a log for weekly opacity observations
15J	401 KAR 52:020 Section 3(1)(b)	15J Polypropylene Line	When corrective actions are required due to an opacity exceedance as noted in Emission Limitations the permittee shall submit the following information from the control device inspection and repair log.	Not applicable for this condition	Currently in compliance and have no exceedances to report
15J	401 KAR 59:010 Section 3(2)	15J Polypropylene Line	Mass emission standard. For emissions from a control device or stack no person shall cause, suffer, allow or permit the emission into the open air of particulate matter from any affected facility which is in excess of the quantity specified in Appendix A to this administrative regulation	Not applicable for this condition	The source is considered to be in compliance when the emission points are operating and properly maintained according to the manufacturer's recommendations. Refer to Subsection 4. Monitoring Requirements. Have a log for weekly opacity observation. Have PM for the lower room silo and south rail dock baghouses.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].2B.[Boilers Tamp].2.	EP08 Two Cleaver Brooks Boilers Kewanne Boiler	Opacity: ≤ 20 % opacity EXCEPT: ≤ 40% opacity for ≤ 6 consecutive min. in any 60-consecutive minutes during cleaning the firebox OR blowing soot.	Not applicable for this condition	The boiler is considered to be in compliance when firing natural gas.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].4.A,4C Includes: B.[Boilers/Cleav-Kew].5.A, 5.B,5C B.[Boilers Tamp].4.A, 5.A,5.B,5C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Record: for each fuel burned: • type • amount • date and time burned • lower heating value, • S-content	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].5.A, 5.B,5C 401 KAR 59:015 sec 4(1)© & Sec 5(1)9c	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PM < .40 lbs./MBTU SO2<1.67 lbs./MBTU	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E32	B.[Boilers Tamp].6C	Boilers • Tampella	SUBMIT: Quarterly NSPS Dc Report 30d after reporting period	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].3 B.[Boilers Tamp].3.C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PERFORMANCE TEST: each boiler within 6 mo. after using No. 2 fuel-oil: • PM • opacity • SO2	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.

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GP-E08 GP-E21 GP-E32	401 KAR 52:020 Section 3(1)(b)]	Boilers • Cleaver Brooks (2) • Kewanee • Tampella	Specific Recordkeeping Requirements: Keep a monthly record of the type and amount of each fuel used. Keep all records of regular maintenance and any necessary repairs to the equipment.	Not applicable for this condition	Have meters to record usage. The regular maintenance and necessary repairs are recorded through preventative maintenance in Maximo. A combustion efficiency PM is normally conducted quarterly but at less annually.
GP-E08 GP-E21 GP-E32	40CFR 63.7540(a)(10)	Boilers • Cleaver Brooks (2) • Kewanee • Tampella	Conduct an annual tune-up of each boiler. Record CO2 readings before and after the tune-up of the boiler or process heater.	Not applicable for this condition	Currently conduct a internal and 3rd party audit on each boiler on a annual basis. The facility also has third party comes in quarterly to tune and measure the efficiency of each boiler.
GP-E08 GP-E21 GP-E32	40CFR 63 Subpart DDDDD table 3	Boilers • Cleaver Brooks (2) • Kewanee • Tampella	Conduct a one-time energy assessment performed by a qualified energy assessor by 1/31/2016	Not applicable for this condition	Conducted a energy assessment 1/11/2016 - 1/15/2016, the plant was ISO 50001 certified in 2016. The plant also has a active energy reduction team on site
GP-E08 GP-E21 GP-E32	§63.7545(e) for MACT 5D	Boilers • Cleaver Brooks (2) • Kewanee • Tampella	Notification of Compliance Status Report for MACT DDDDD	Not applicable for this condition	Notification of Compliance Status Report for MACT DDDDD The facility complies with the required initial tune-up according to the procedures in §63.7540(a)(10)(i) through (vi). and the facility has had an energy assessment performed according to §63.7530(e).
T3 T4	B.[HAP Tanks].5.A MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	• records showing the dimensions of the vessel, AND • an analysis showing capacity	Not applicable for this condition T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011	Have drawings of tanks, showing the dimensions of the vessel. and capacity. T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011
T3 T4	B.[HAP Tanks].6 MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	SUBMIT: Semi-annual MACT EEEE Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
PSB-1	B. [Paint Booth]. 1. B. [Paint Booth]. 4.A. B. [Paint Booth]. 5.E.	PSB-1 Spray Paint Booth	Particulate filters in place anytime the spray booths are in operation. opacity: ≤ 20 % opacity PM: ≤ 2.34 lb./hr. Resistance to airflow [1] one per 8 hrs. of operation. Record each filter replacement	Not applicable for this condition	Fixed Monometer in place. Have a procedure and a log book in place to track filter changes and usages.
PSB-1	B. [Paint Booth]. 5.A. B. [Paint Booth]. 5.C.	PSB-1 Spray Paint Booth	For each coating, thinner, and clean-up solution used Record: • type • amount • Calculate VOC and HAP emissions,	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions
PSB-1	B. [Paint Booth]. 5.A. B. [Paint Booth]. 5.C.	PSB-1 Spray Paint Booth	Opacity checks weekly	Conduct opacity checks for paint booth at each use or weekly. Paint booth only used in Feb, March, April, May, June and December of 2022 no visible emissions noted during use	Operator logs usages in log book. The paint booth log was modified to include opacity checks at each use or weekly if used more than once in a week. Typically the paint booth is only operated once every few months.
PCT1 PCT2 PCT3	B. [Parts Clean]. 1.A. B. [Parts Clean]. 1.B.; B. [Parts Clean]. 1.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	1) Disposal of Waste solvent: do not dispose of so that >20 %wt. of the waste solvent can evaporate to atm. 2) Store waste solvent only in covered containers 3) Close covers if not handling parts in the cleaners 4) Drain cleaned parts at least 15s until dripping ceases 5) Spill response procedures	Not applicable for this condition (solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthia on 2/2009)	Operator log usages in log book, have SOP in place for cleaning tanks, also have emergency response procedures for spills.

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PCT1 PCT2 PCT3	B. [Parts Clean] 5.A. B. [Parts Clean] 5.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	Record monthly for each solvent used during the month: • type of solvent • VOC content • HAP content Calculate VOC emissions	12 mo. Max Rolling total for VOC = 2.32 tons (1/2022) 12 mo. Max Rolling total for HAP = 1.12 tons (1/2022) This is already included with each individual coating line	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals. Permit amended in R3 4/8/2009 "Use the site specific clean-up solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthia on 2/2009".
Diesel Generator & Fire pump	40CFR 63.6602 and Table 2c	Emergency Engines	Change oil/filter Inspect air cleaner Inspect all hoses & belts 500hr or annually engine startup < 30 min	Not applicable for this condition.	Have a annual maintenance PM for these engines
Diesel Generator & Fire pump	40CFR 63.6640 (f)(1)(ii)	Emergency Engines	Maintenance Checks and testing limited to 100 hours per year & < 50 hours per year for non-emergency situations	Not applicable for this condition.	Maintenance checks are done once per week less than an hour each. Hours are recorded on Maintenance log store by each engine
Diesel Generator & Fire pump	40CFR 63.6625 (f)	Emergency Engines	install a non-resettable hour meter	Not applicable for this condition.	Each engine has a hour meter which are recorded during PM's
Diesel Generator & Fire pump	40CFR 63.6655	Emergency Engines	Recordkeeping Keep records of notifications, malfunctions and maintenance for 5 years	Not applicable for this condition.	Keep records of all maintenance WO, malfunctions and notifications.
Facility-wide Insignificant activity	Section C 401 KAR 52:020 Sec 6 V-18-009	Insignificant Activities	Insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emission evaluation made	Not applicable for this condition.	Monthly inspection Logged for Sandblaster, Baier dust collector and dust collector for rubber
Facility-wide	Sec D.3	Facility-wide	Source Emissions Limit If VOC emission during any 12 month period exceed 225 ton permittee will track annual emissions weekly	Highest rolling VOC total 56.66 Ton 4/2022 Highest rolling HAP total 5.95 ton 4/2022	-Record keeping: emission calculations. This compliance data was collected intermittently. Limit added with permit V-13-009 part of our Flexible Air permitting Rule to meet the source wide cap of 240 Tons of VOC's

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Facility-wide	Attachment A Advance minor new source Review 401 KAR 52:020 Sec 18 Section 502 (b)(10) changes	Facility-wide	Notifications for changes prescribed in this section Notice 7 working days prior to change	Not applicable for this condition	Notice 7 working days prior to change 30 days after commencement date of max production rate within 180 days of start-up conduct a performance demonstration
Facility-wide	F.10	Facility-wide	Submit: Annual Emission Inventory	Have submitted last year for 2021	Within 30d of the date the KYEIS emission. survey is mailed
Facility-wide	F.09	Facility-wide	Submit: Annual Compliance Certification	Will submit on time for 2022	Use Compliance Certification Form (DEP 7007CC), due 1/30 of every year
Facility-wide	F.7.b.	Facility-wide	Applies if: emissions due to a malfunction, unplanned shutdown AND/OR ensuing startup are OR may be in excess of the	Not applicable for this condition	Notify Florence Regional Office if emissions due to a malfunction, unplanned shutdown and/or ensuing startup are or may be in excess of the standards
Facility-wide	F.5 F.6	Facility-wide	SUBMIT: Semi-Annual Title V Monitoring Report & Semi-Annual CEMS Monitoring Report	Have submitted Semi-annual reports for 2022	Submit with Semi-annual reports, 7/30 and 1/30 of every year

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Subject to Future Compliance Dates

10b) Emission Units Subject to Future Compliance Dates. *The following emission units will achieve compliance on a timely basis and maintain compliance with future compliance dates as they become applicable during the permit term. If additional space is required, reproduce this page as needed.*

Emission Unit/Permit ID#	Future Compliance Schedule	Emission Unit Description	Reason for Future Compliance Date
NA	NA		

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance

10e)(1) Emission Units Not in Continuous Compliance. *The following emission units were not in continuous compliance with each permit term or condition and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.*

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or Requirement	Actual Emissions or Status of Requirement	The method used for determining compliance over the reporting period, and whether compliance was continuous or intermittent. (such as test methods, monitoring procedures, recordkeeping and reporting)

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance (continued)

10c)(2) Emission Units Not in Continuous Compliance. For the emission units and requirements listed in 10c)(1) that were not in continuous compliance since the last reporting period, state the duration, magnitude, and reason or reasons for non-compliance. Each row of 10c)(2) must relate to the corresponding row of 10c)(1). If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Description of duration, magnitude, and reason(s) for non-compliance and corrective steps taken or planned.

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 Frankfort, KY 40601
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DEP7007DD

Insignificant Activities

___ Section DD.1: Table of Insignificant Activities

___ Section DD.2: Signature Block

___ Section DD.3: Notes, Comments, and Explanations

Source Name: 3M Cynthiaiana

KY EIS (AFS) #: 21-097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

Section DD.1: Table of Insignificant Activities

*Identify each activity with a unique Insignificant Activity number (IA #); for example: 1, 2, 3... etc.

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
79	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
80	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
81	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
82	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
83	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
84	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
85	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
86	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
4	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
5	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
6	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 3	Categorical Exemption 20	See DD.3 Item 1
7	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 4	Categorical Exemption 20	See DD.3 Item 1

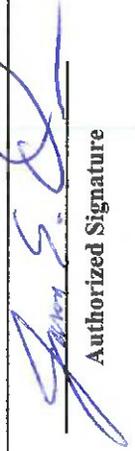
Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
8	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 5	Categorical Exemption 20	See DD.3 Item 1
9	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
10	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
27	3D Printer Capacity: 10 kg	Metal X 3D Printer	Categorical Exemption 17	See DD.3 Item 2
28	Baler and Dust Collector Capacity: 6,000 lbs/hr	Recycling Baler and Dust Collector	401 KAR 52:020 Section 6	Calculated emissions included on Attachment A
51 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 100 gallons	2R - PC2 Station - 2R LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
52	Holding Tank Capacity: 50 gallons	2R - Functional Coat Station - 2R Adhesive Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
53 - Table 1B Unit to be Reclassified as IA	Cleaning Cart Capacity: 2.71 ft ²	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	401 KAR 52:020 Section 6	See DD.3 Item 3 and 10, Calculated emissions included on Attachment A
54 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 2.71 ft ²	2R - (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L	401 KAR 52:020 Section 6	See DD.3 Item 3 and 11, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Die Cleaning Hood Capacity: Not applicable	2R - 2R Die Cleaning Hood	Non-emitting	See DD.3 Items 3, 5
55 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Drums Capacity: 30 gallons	2R - 2R IPA Cleaning Solution Drums	Categorical Exemption 2	See DD.3 Items 3, 6
56 - Table 1A Unit to be Reclassified as IA	Flametreater Capacity: 1.4 MMBtu/hr	3R - Flametreater	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Resin Compounding Capacity: Not Applicable	3R - 3R Bay - Resin Compounding	Non-emitting	See DD.3 Items 3, 7
57 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 2000 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
58	Holding Tank Capacity: 750 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
59 - Table 1B Unit to be Reclassified as IA	Powder Handling Capacity: 0.007 gr/scf	3R - 3R Bay - Supersack Powder Handling	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
60	Rubber Dust Collector Capacity: 2,000 lbs/hr	3R - 3R Bay - Rubber Dust Collector	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Maintenance Parts Washer Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
62 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 30 gallons	3R - 3R Bay - IPA Cleaning Solution Drums (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
63 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 25 gallons	4R - PC1 Station - Primer Holding Tank (25 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
64 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 68 gallons	4R - PC2 Station - LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
65	Cleaning Station Capacity: 30 gallons	4R - Adhesive Cleaning Station (IPA)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 1 Capacity: Not Applicable	Solvent Compounding - Room 161 - Compounding Area 1	Non-emitting	See DD.3 Items 3, 8
66 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Mix Tank	Categorical Exemption 2	See DD.3 Items 3, 6
67 - Table 1B Unit to be Reclassified as IA	Solids Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Solids Tank	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 2 Capacity: Not Applicable	Solvent Compounding - Room 162 - Compounding Area 2	Non-emitting	See DD.3 Items 3, 8
68 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 3,600 gallons	Solvent Compounding - Room 162 - Adhesive Mix Tank #2	Categorical Exemption 2	See DD.3 Items 3, 6
69 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 5,000 gallons	Solvent Compounding - Room 162 - Adhesive Storage Tank (5000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
70 - Table 1B Unit to be Reclassified as IA	Surge Tank Capacity: 100 gallons	Solvent Compounding - Room 162 - Heptane Surge Tank (Solvent)	Categorical Exemption 2	See DD.3 Items 3, 6
71 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,000 gallons	Solvent Compounding - Room 162 - LAB Storage Tank (2000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 3 Capacity: Not Applicable	Solvent Compounding - Room 163 - Compounding Area 3	Non-emitting	See DD.3 Items 3, 8
72 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 55 gallons	Solvent Compounding - Room 163 - MEK Cleaning Solution (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
73 - Table 1B Unit to be Reclassified as IA	Myers Tote Mixer Capacity: 275 gallons	Solvent Compounding - Room 163 - Myers Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
74 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
75 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
76 - Table 1B Unit to be Reclassified as IA	Cowles Mixer Capacity: 300 gallons	Waterbased Compounding - Cowles Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
77 - Table 1B Unit to be Reclassified as IA	Lightning Mixer Capacity: 55 gallons	Waterbased Compounding - Lightning Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
78	Dyno Mixer Capacity: 300 gallons	Waterbased Compounding - Dyno Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
45 - 15J-19 to be Reclassified as IA	Pellet Dryer, Beringer Air Dryer Capacity: 1,200 lbs/hr	15J - 15J-19 - Pellet Dryer, Beringer Air Dryer	Non-emitting	See DD.3 Items 3, 9

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
46	Extruder Capacity: 640 lbs/hr	15J - Coextruder 1	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
47	Extruder Capacity: 640 lbs/hr	15J - Coextruder 2	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
48	Extruder Capacity: 5,500 lbs/hr	15J - Metering Melt Extruders	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
49	Polypropylene Dust Collector Capacity: 0.63 lbs/hr	15J - Polypropylene Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
50	High Density Storage Tank Dust Collector Capacity: 2.08 lbs/hr	15J - High Density Storage Tank Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A

Section DD.2: Signature Block

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.


 Authorized Signature

By:

Jason Orr

3/17/2023

Date

Plant Director

Title of Signatory

Type/Print Name of Signatory

Section DD.3: Notes, Comments, and Explanations

1. Emission calculations are not provided for this unit because it is "equipment used for compression, molding, and injection of plastics" (Categorical Exemption 20).
2. Emission calculations are not provided for this unit because it is "equipment used exclusively for forging, pressing, drawing, stamping, spinning or extruding metals" (Categorical Exemption 17).
3. Prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's air permit (V-18-009) were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities.
4. Emissions calculations are not provided for this unit because emissions from this unit are negligible and would not exceed 5 tons per year for a regulated pollutant or 1,000 pounds of combined HAP.
5. Emission calculations are not provided for this unit because the emissions from die cleaning hood are associated with units operating in the area and accounted for at the individual unit.
6. Emission calculations are not provided for this unit because it is a "storage vessel having less than 10,567 gallons capacity that contains petroleum or organic liquids with a vapor pressure of 1.5 psia or less at storage temperature" (Categorical Exemption 2).
7. Emission calculations are not provided for this unit because the emissions from resin compounding are associated with units operating in the area and accounted for at the individual unit.
8. Emission calculations are not provided for this unit because the emissions from solvent compounding are associated with units operating in the area and accounted for at the individual unit.
9. Emission calculations are not provided for this unit because the emissions from pellet dryer, beringer air dryer are associated with units operating in the area and accounted for at the individual unit. The unit is electrically powered.
10. Unit was originally called "1R - 1R Primer Station - 1R/2R Cleaning Cart (MEK)" and is requested to be updated to "2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)" since the 1R Line has been decommissioned and the unit is now used with the 2R and 4R Lines.
11. Unit was originally called "2R - (PCT1) - 2R Cleaning Tank, 6'W x 65'L" and is requested to be updated to "2R - (PCT1) - 2R/4R Cleaning Tank, 6'W x 65'L" since the unit is used with the 2R and 4R Lines.

DEP7007DD Insignificant Activities
Section DD.1 Table of Insignificant Activities - Attachment A

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpy)	Pollution Contr Eff (%)	Controlled PTE (tpy)
28	Recycling Baler and Dust Collector	PM	4.80E-04	2.10E-03	0	2.10E-03
		PM10	4.80E-04	2.10E-03	0	2.10E-03
		PM2.5	4.80E-04	2.10E-03	0	2.10E-03
53	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	VOC	0.217	0.949	0	0.949
54	2R - (PCT 1) - 2R/4R Cleaning Tank, 6"W x 65"L	VOC	0.217	0.949	0	0.949
56	3R - 3R Flametreater	PM	0.010	0.046	0	0.046
		PM10	0.010	0.046	0	0.046
		PM2.5	0.010	0.046	0	0.046
		VOC	0.008	0.033	0	0.033
		SO2	8.24E-04	3.61E-03	0	3.61E-03
		NOx	0.137	0.601	0	0.601
		CO	0.115	0.505	0	0.505
		Lead	6.86E-07	3.01E-06	0	3.01E-06
		Total HAP	2.59E-03	0.011	0	0.011
59	3R - 3R Bay - Supersack Powder Handling	PM	0.660	2.891	0	2.891
		PM10	0.146	0.638	0	0.638
		PM2.5	0.146	0.638	0	0.638
60	3R - 3R Bay - Rubber Dust Collector	PM	0.640	2.803	0	2.803
		PM10	0.640	2.803	0	2.803
		PM2.5	0.640	2.803	0	2.803
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Filter Cleaning Tank	VOC	0.464	2.031	0	2.031
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Maintenance Parts Washer	VOC	0.464	2.031	0	2.031
74	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	VOC	0.006	0.026	0	0.026
75	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	Total HAP	3.42E-05	1.50E-04	0	1.50E-04
		VOC	0.004	0.019	0	0.019
		Total HAP	3.42E-05	1.50E-04	0	1.50E-04

PTE = Potential to emit

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpy)	Pollution Contr Eff (%)	Controlled PTE (tpy)
46	15J - Coextruder 1	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
47	15J - Coextruder 2	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
48	15J - Metering and Melt Extruder	PM	0.825	3.614	0	3.614
		PM10	0.825	3.614	0	3.614
		PM2.5	0.825	3.614	0	3.614
		VOC	1.051	4.601	0	4.601
		Total HAP	0.030	0.131	0	0.131
49	15J - Polypropylene Dust Collector	PM	0.006	0.028	0	0.028
		PM10	0.047	0.206	0	0.206
		PM2.5	0.047	0.206	0	0.206
		PM	0.021	0.092	0	0.092
50	15J - High Density Storage Tank Dust Collector	PM10	0.157	0.687	0	0.687
		PM2.5	0.157	0.687	0	0.687

PTE = Potential to emit

Division for Air Quality

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Frankfort, KY 40601
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DEP7007N

Source Emissions Profile

- ___ Section N.1: Emission Summary
- ___ Section N.2: Stack Information
- ___ Section N.3: Fugitive Informator
- ___ Section N.4: Notes, Comments, and Explanations

Additional Documentation

___ Complete DEP7007AI

Source Name: 3M Cynthiana

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

N.1: Emission Summary

Emission Unit #	Emission Unit Name	Process ID	Process Name	Control Device Name	Control Device ID	Stack ID	Maximum Design Capacity (SCC Units/hour)	Pollutant	Uncontrolled Emission Factor (lb/SCC Units)	Emission Factor Source (e.g. AP-42, Stack Test, Mass Balance)	Capture Efficiency (%)	Control Efficiency (%)	Hourly Emissions		Annual Emissions	
													Uncontrolled Potential (lb/hr)	Controlled Potential (lb/hr)	Uncontrolled Potential (tons/yr)	Controlled Potential (tons/yr)
EU68	Corona Treater 1	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP09	52 KW	VOC	0.07 lb/KW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU69	Corona Treater 2	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP10	52 KW	VOC	0.07 lb/KW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU70	Coater Cleaning Fugitive	3R	3R	N/A	N/A	N/A	0.41 lb/hr	VOC	1 lb/lb	Engineering Estimate	N/A	N/A	0.41	0.41	1.80	1.80
EU70	Coater Cleaning Fugitive	3R	3R	N/A	N/A	N/A	0.30 lb/hr	Total HAP	2 lb/lb	Engineering Estimate	N/A	N/A	0.30	0.30	1.08	1.08
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	16.79 lb/hr	VOC	3 lb/lb	Engineering Estimate	N/A	N/A	16.79	16.79	73.55	73.55
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	2.33 lb/hr	Total HAP	4 lb/lb	Engineering Estimate	N/A	N/A	2.33	2.33	10.21	10.21

Section N.2: Stack Information

UTM Zone:

Stack ID	Identify all Emission Units (with Process ID) and Control Devices that Feed to Stack	Stack Physical Data			Stack UTM Coordinates		Stack Gas Stream Data		
		Equivalent Diameter (ft)	Height (ft)	Base Elevation (ft)	Northing (m)	Easting (m)	Flowrate (acfm)	Temperature (°F)	Exit Velocity (ft/sec)
EP09	Corona Treater 1	1.15	7.25	30	16S 736278.62	4250850.43	3480	68	32.82
EP10	Corona Treater 2	1.15	7.25	30	16S 736277.81	4250848.18	3480	68	32.82

Section N.3: Fugitive Information

UTM Zone:

Emission Unit #	Emission Unit Name	Process ID	Area Physical Data		Area UTM Coordinates		Area Release Data	
			Length of the X Side (ft)	Length of the Y Side (ft)	Northing (m)	Easting (m)	Release Temperature (°F)	Release Height (ft)
EU70	Coater Cleaning - Fugitive	3R	10	10	16S 4250880.73	736303.70	68	60
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	148	545	16S 4250894.00	736290	68	60

Section N.4: Notes, Comments, and Explanations

1. Corona treaters associated with the 15J Polypropylene Extrusion Line were originally permitted as a combined unit "Corona Treaters (2) 52 kwh each." 3M requests that the units be split into two individual emission units: EU 68 Corona Treater 1 and EU 15J10 Corona Treater 2. There is no increase in emissions as part of this change since the original calculations were based on the combined kW rating of the units.

2. 3M requests that fugitive emissions from cleaning of coater 3R with rags be included as a fugitive emission source: EU 70 Coater Cleaning. Emission data are based on historical solvent use associated with coater cleaning, with a safety factor applied. Engineering estimates assume that 15% of the solvent used is lost to the atmosphere and the remaining 85% of the solvent is disposed of as waste (e.g., solvent rags). The maximum design capacity in N.1 is based on the total VOC/HAP lost during cleaning, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.

3. 3M requests that fugitive emissions from equipment leaks associated with material piping for 2R, 3R, and 4R coating lines be included as a fugitive emission source: EU 71 Equipment Leaks. Emission data are based on the total number of components (e.g., valves, flange connectors, pumps, sampling connectors, pressure relief valves, open-ended lines, etc.), with a safety factor applied. Emission factors from Protocol for Equipment Leak Emission Estimates, EPA-453/R-95-017, Table 2-1 and maximum VOC content from material SDSs were used to calculate total VOC/HAP emission losses from components. The maximum design capacity in N.1 is based on the total VOC/HAP emission losses from components, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.

4. Data provided on N.3 for fugitives is based on the area of the facility where the fugitive emissions occur. Lengths X and Y are based on the overall physical footprint of the processes and the UTM coordinate is from the middle point of that area. Because the emissions are fugitive, it should be noted that there may be multiple release points since the emissions can be captured by various local exhausts and process area HVAC ventilation.

Division for Air Quality 300 Sower Boulevard Frankfort, KY 40601 (502) 564-3999	DEP7007V Applicable Requirements and Compliance Activities
___ Section V.1: Emission and Operating Limitation(s) ___ Section V.2: Monitoring Requirements ___ Section V.3: Recordkeeping Requirements ___ Section V.4: Reporting Requirements ___ Section V.5: Testing Requirements ___ Section V.6: Notes, Comments, and Explanations	Additional Documentation ___ Complete DEP7007AI

Source Name: 3M Cynthiaiana
KY EIS (AFS) #: 21- 097-00021
Permit #: V-18-009
Agency Interest (AI) ID: 1752
Date: 3/17/2023

Section V.1: Emission and Operating Limitation(s)

Emission Unit #	Emission Unit Description	Applicable Regulation or Requirement	Pollutant	Emission Limit (if applicable)	Voluntary Emission Limit or Exemption (if applicable)	Operating Requirement or Limitation (if applicable)	Method of Determining Compliance with the Emission and Operating Requirement(s)
EU 68	Corona Treater 1	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Emission Unit #	Emission Unit Description	Applicable Regulation or Requirement	Pollutant	Emission Limit (if applicable)	Voluntary Emission Limit or Exemption (if applicable)	Operating Requirement or Limitation (if applicable)	Method of Determining Compliance with the Emission and Operating Requirement(s)
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Section V.2: Monitoring Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Monitored	Description of Monitoring
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 72	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.3: Recordkeeping Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Recorded	Description of Recordkeeping
EU 66	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 70	Coater Cleaning - Fugitive	Total HAP	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.4: Reporting Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Reported	Description of Reporting
EU 68	Corona Treater 1	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 69	Corona Treater 2	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.

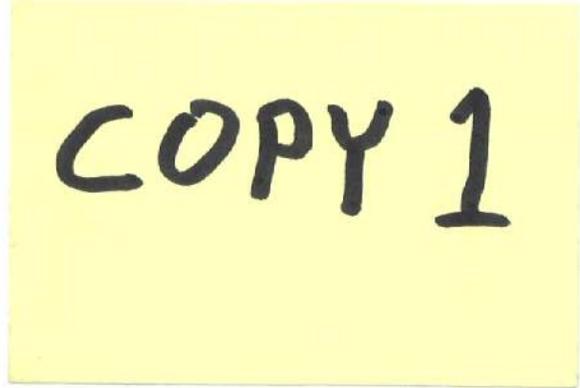
Section V.5: Testing Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Tested	Description of Testing
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.6: Notes, Comments, and Explanations



March 17, 2023



Electronic Submittal – Kentucky Business One Stop

Kentucky Division for Air Quality
Attn: Permit Support Section
300 Sower Boulevard
Frankfort, KY 40601

Subject: 3M Cynthiana Title V Operating Permit Renewal - Permit ID: V-18-009
KY EIS (AFS) #: 21-097-00021
Agency Interest (AI) ID: 1752

Dear Document Coordinator:

Enclosed are three copies of the Title V permit renewal application for the 3M Cynthiana facility located at 1309 New Lair Road in Cynthiana, KY, as required by 401 KAR 52:020, Section 5. In accordance with 401 KAR 52:020, Section 12, Item (4), an application for a permit renewal is required to be submitted no later than six months prior to the expiration of the current Title V permit (#V-18-009), which was issued on September 22, 2018 and expires on September 22, 2023. As required by Kentucky rules, this application is being submitted prior to March 22, 2023, six months prior to expiration.

Only information that is new or different from the information in the facility's current Title V is required to be included in the permit renewal application, pursuant to 401 KAR 52:020, Section 4, Item (2)(c). Since the issuance of the facility's current Title V permit, 3M Cynthiana has made numerous modifications classifiable as insignificant or trivial activities. Additionally, prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's current Title V permit were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities. These changes are noted on the enclosed DEP7007DD, DEP7007N, and DEP7007V forms.

A redline version of the current Title V permit is included to illustrate these requested changes, as well as updating requirements for units that have been decommissioned and revising permit language to incorporate updates made to referenced federal regulatory requirements.

If you have any questions or comments, please contact me at (651)-788-2580 or via email at rnavis@mmm.com.

Sincerely,

Ryan Navis
Senior Environmental Engineer

Division for Air Quality
 300 Sower Boulevard
 Frankfort, KY 40601
 (502) 564-3999

DEP7007AI
Additional Documentation
 Additional Documentation attached

Administrative Information
 Section AI.1: Source Information
 Section AI.2: Applicant Information
 Section AI.3: Owner Information
 Section AI.4: Type of Application
 Section AI.5: Other Required Information
 Section AI.6: Signature Block
 Section AI.7: Notes, Comments, and Explanations

Source Name: 3M Cynthiana
 KY EIS (AFS) #: 21- 097-00021
 Permit #: V-18-009
 Agency Interest (AI) ID: 1752
 Date: 3/17/2023

Section AI.1: Source Information
 Physical Location Street: 1309 New Lair Road
 Address: City: Cynthiana County: Harrison Zip Code: 41031
 Street or P.O. Box: 3M Center, Building 225-01-N-22
 Mailing Address: City: St. Paul State: MN Zip Code: 55144-1000

Standard Coordinates for Source Physical Location
 Longitude: 84.294722 (decimal degrees) Latitude: 38.375 (decimal degrees)

Primary (NAICS) Category: Stationary Product Manufacturing Primary NAICS #: 322230

Classification (SIC) Category:	Stationary Products	Primary SIC #: 2678	
Briefly discuss the type of business conducted at this site: Facility manufactures and coats pressure sensitive adhesives to make tapes and note pads.			
Description of Area Surrounding Source:	<input type="checkbox"/> Rural Area <input type="checkbox"/> Urban Area	<input type="checkbox"/> Industrial Park <input checked="" type="checkbox"/> Industrial Area	<input type="checkbox"/> Residential Area <input type="checkbox"/> Commercial Area Is any part of the source located on federal land? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Approximate distance to nearest residence or commercial property: 500 ft	Property Area: 51.38 acres	Number of Employees: 360	Is this source portable? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
What other environmental permits or registrations does this source currently hold or need to obtain in Kentucky?			
NPDES/KPDES:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
Solid Waste:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
RCRA:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
UST:	<input type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input checked="" type="checkbox"/> N/A
Type of Regulated Waste Activity:	<input type="checkbox"/> Mixed Waste Generator <input type="checkbox"/> U.S. Importer of Hazardous Waste	<input checked="" type="checkbox"/> Generator <input type="checkbox"/> Transporter	<input type="checkbox"/> Recycler <input type="checkbox"/> Treatment/Storage/Disposal Facility <input type="checkbox"/> Other: _____ <input type="checkbox"/> N/A

Section AI.2: Applicant Information

Applicant Name: 3M Company

Title: (if individual) N/A

Mailing Address: Street or P.O. Box: _____
 City: _____ State: _____ Zip Code: _____

Email: (if individual) _____

Phone: _____

Technical Contact

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22
 City: St. Paul State: MN Zip Code: 55144-1000

Email: rnavis@mmm.com

Phone: (651)-788-2580

Air Permit Contact for Source

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22
 City: St. Paul State: MN Zip Code: 55144-1000

Email: rnavis@mmm.com

Phone: (651)-788-2580

Section A1.3: Owner Information

Owner same as applicant

Name:

Title:

Mailing Address:

Street or P.O. Box:

City:

State:

Zip Code:

Email:

Phone:

List names of owners and officers of the company who have an interest in the company of 5% or more.

Name

Position

For a list of current 3M Corporate Officers, please visit this webpage:

<http://investors.3m.com/governance/corporate-officers/default.aspx>

Section AI.4: Type of Application

Current Status: Title V Conditional Major State-Origin General Permit Registration None

Name Change Initial Registration Significant Revision Administrative Permit Amendment

Renewal Permit Revised Registration Minor Revision Initial Source-wide Operating Permit

502(b)(10)Change Extension Request Addition of New Facility Portable Plant Relocation Notice

Revision Off Permit Change Landfill Alternate Compliance Submittal Modification of Existing Facilities

Ownership Change Closure

Requested Status: Title V Conditional Major State-Origin PSD NSR Other: _____

Is the source requesting a limitation of potential emissions?

Pollutant:	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Requested Limit:
<input type="checkbox"/> Particulate Matter	_____	_____
<input type="checkbox"/> Volatile Organic Compounds (VOC)	_____	_____
<input type="checkbox"/> Carbon Monoxide	_____	_____
<input type="checkbox"/> Nitrogen Oxides	_____	_____
<input type="checkbox"/> Sulfur Dioxide	_____	_____
<input type="checkbox"/> Lead	_____	_____

For New Construction:

Proposed Start Date of Construction: (MM/YYYY)

Proposed Operation Start-Up Date: (MM/YYYY)

For Modifications:

Proposed Start Date of Modification: (MM/YYYY)

Proposed Operation Start-Up Date: (MM/YYYY)

Applicant is seeking coverage under a permit shield. Yes No Identify any non-applicable requirements for which permit shield is sought on a separate attachment to the application.

Section AI.5 Other Required Information

Indicate the documents attached as part of this application:

- | | |
|--|--|
| <input type="checkbox"/> DEP7007A Indirect Heat Exchangers and Turbines | <input type="checkbox"/> DEP7007CC Compliance Certification |
| <input checked="" type="checkbox"/> DEP7007B Manufacturing or Processing Operations | <input checked="" type="checkbox"/> DEP7007DD Insignificant Activities |
| <input type="checkbox"/> DEP7007C Incinerators and Waste Burners | <input type="checkbox"/> DEP7007EE Internal Combustion Engines |
| <input type="checkbox"/> DEP7007F Episode Standby Plan | <input type="checkbox"/> DEP7007FF Secondary Aluminum Processing |
| <input type="checkbox"/> DEP7007J Volatile Liquid Storage | <input type="checkbox"/> DEP7007GG Control Equipment |
| <input type="checkbox"/> DEP7007K Surface Coating or Printing Operations | <input type="checkbox"/> DEP7007HH Haul Roads |
| <input type="checkbox"/> DEP7007L Mineral Processes | <input type="checkbox"/> Confidentiality Claim |
| <input type="checkbox"/> DEP7007M Metal Cleaning Degreasers | <input type="checkbox"/> Ownership Change Form |
| <input checked="" type="checkbox"/> DEP7007N Source Emissions Profile | <input type="checkbox"/> Secretary of State Certificate |
| <input type="checkbox"/> DEP7007P Perchloroethylene Dry Cleaning Systems | <input type="checkbox"/> Flowcharts or diagrams depicting process |
| <input type="checkbox"/> DEP7007R Emission Offset Credit | <input type="checkbox"/> Digital Line Graphs (DLG) files of buildings, roads, etc. |
| <input type="checkbox"/> DEP7007S Service Stations | <input type="checkbox"/> Site Map |
| <input type="checkbox"/> DEP7007T Metal Plating and Surface Treatment Operations | <input type="checkbox"/> Map or drawing depicting location of facility |
| <input checked="" type="checkbox"/> DEP7007V Applicable Requirements and Compliance Activities | <input type="checkbox"/> Safety Data Sheet (SDS) |
| <input type="checkbox"/> DEP7007Y Good Engineering Practice and Stack Height Determination | <input type="checkbox"/> Emergency Response Plan |
| <input type="checkbox"/> DEP7007AA Compliance Schedule for Non-complying Emission Units | <input type="checkbox"/> Other: _____ |
| <input type="checkbox"/> DEP7007BB Certified Progress Report | |

Section AI.6: Signature Block

I, the undersigned, hereby certify under penalty of law, that I am a responsible official*, and that I have personally examined, and am familiar with, the information submitted in this document and all its attachments. Based on my inquiry of those individuals with primary responsibility for obtaining the information, I certify that the information is on knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false or incomplete information, including the possibility of fine or imprisonment.


Authorized Signature

Jason Orr

Type or Printed Name of Signatory

3/17/2023

Date

Plant Director

Title of Signatory

*Responsible official as defined by 401 KAR 52:001.

Division for Air Quality

300 Sower Boulevard
Frankfort, KY 40601
(502) 564-3999

DEP7007B

Manufacturing or Processing Operations

___ Section B.1: Process Information
___ Section B.2: Materials and Fuel Information
___ Section B.3: Notes, Comments, and Explanations

Additional Documentation

___ Complete DEP7007AI, DEP7007N,
DEP7007V, and DEP7007GG.
___ Attach a flow diagram
___ Attach SDS

Source Name: 3M Cynthiaana

KY EIS (AFS) #: 21-097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

Section B.1: Process Information

Emission Unit #	Emission Unit Name	Describe Emission Unit	Process ID	Process Name	Manufacturer	Model No.	Proposed/Actual Date of Construction Commencement (MM/YYYY)	Is the Process Continuous or Batch?	Number of Batches per 24 Hours (if applicable)	Hours per Batch (if applicable)
EU 68	Corona Treater 1	Corona treater	15J	15J Polypropylene Extrusion Line	Softal Corona & Plasma	Series 60300	06/2002	Continuous	N/A	N/A
EU 69	Corona Treater 2	Corona treater	15J	15J Polypropylene Extrusion Line	Softal Corona & Plasma	Series 9000	03/2014	Continuous	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Fugitive emissions from coater cleaning	3R	3R	N/A	N/A	10/2001	Batch	See B.3 Item 4	See B.3 Item 4
EU 71	Equipment Leaks - Fugitive	Fugitive emissions from piping components	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	08/1985	Continuous	N/A	N/A

Section B.2: Materials and Fuel Information

**Maximum yearly fuel usage rate only applies if applicant request operating restrictions through federally enforceable limitations.*

Emission Unit #	Emission Unit Name	Name of Raw Materials Input	Maximum Quantity of Each Raw Material Input		Total Process Weight Rate for Emission Unit (tons/hr)	Name of Finished Materials	Maximum Quantity of Each Finished Material Output		Fuel Type	Maximum Fuel Usage Rate		Maximum Yearly Fuel Usage Rate	Sulfur Content (%)	Ash Content (%)
			(Specify Units/hr)	(Specify Units/hr)			(Specify Units/hr)	(Specify Units)		(Specify Units)				
EU 68	Corona Treater 1	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Solvent (contains VOC, HAP)	0.41	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Solvent (contains VOC, HAP)	16.79	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A

Section B.3: Notes, Comments, and Explanations

- 1. There are no control devices associated with the emission units listed in B.1, thus Form DEP7007 GG is not included in the permit application.
- 2. There are no new SDS associated with emission units listed in B.1.
- 3. There are no changes to the PFDs for the processes associated with the emission units listed in B.1.
- 4. The frequency of coater cleaning is variable depending on the types of coating material used and the duration of a product run.
- 5. Operation of the corona treaters and fugitive emissions from cleaning and equipment leaks do not directly correlate to a process weight or finished materials. These units by themselves do not manufacture a product, they are part of existing permitted process lines at the facility. For additional details on the processes the units are associated with and their emissions, see the DEP7007N Source Emissions Profile form included with this application.

Division for Air Quality Submit to the Regional Office identified in your permit

DEP7007CC Compliance Certification Section CC.1: Source Information Section CC.2: Signature Block Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit Section CC.4: Notes, Comments, and Explanations

Section CC.1: Source Information

1) Source Name 3M Cynthiaiana 2) Agency Interest (AI) ID 1752

3) Source Location Address (street, city, state, zip) 1308 New Lair Road

4) Technical Contact (name, e-mail, phone #) Bryan Schroers, bgschroers@mmn.com, 859-569-4238

5) Permit Number(s) V-19-009 6) County Harrison 7) KY EIS (AFS) # 21-097-00021

8) Submittal Information

Are you certifying any requirement(s) as "not in continuous compliance?" Yes No What is the reporting period? 1 mm/ dd/ yy 2022 TO 12 mm/ dd/ yy 2022

Section CC.2: Signature Block

9) CERTIFICATION SIGNATURE

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE STATEMENTS AND INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.

BY: [Signature] AUTHORIZED SIGNATURE

3/17/2023 DATE

Plant Director TITLE OF SIGNATORY

Jason Orr TYPED OR PRINTED NAME OF SIGNATORY

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units in Continuous Compliance

10a) Emission Units in Continuous Compliance. The following emission units were in continuous compliance with each permit term or condition(s) and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	Daily compliance with emission standard of 0.05 lb. VOC emitted/lb. VOC input [95% overall control] Overall VOC control efficiency shall be at least 95% Monthly average	Lowest overall control over 12-month rolling period for 1R 1R has been decommissioned in 2021 Lowest overall control over 12-month rolling period for 2R was 99.53% (2022). Lowest monthly avg. for 2R was 99.53% (2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Testing: Performance Test on 2R thermal oxidizer 8/12/2018 -Testing: Performance Test on 1R RTO 8/11/2018 -CEMS: Calibrated CEMS to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	daily compliance with emission standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period for 1R 1R has been decommissioned in 2021 Overall Control over 12-month period for 2R was 99.53%. Lowest daily overall control average on 2R was 99.53%	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMS to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs. -Not applicable to waterbase primer and linters which are not controlled.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	VOC emissions < or = to 278.1 lb./hr. and 1218.0 tons/yr;	1R has been decommissioned in 2021 Emission for this reporting period = .82lb/hr. average, .89lb/hr. max. monthly avg. (6/2022) and 1.19 tons/yr. highest 12-month rolling (2/2022) with clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	Cleanup emissions < or = to 1.14 lb./hr. and 4.99 tons/yr.	Emissions for this reporting period = .08 lb./hr. average, .29lb/hr. max. monthly avg. (2/2022) and .136 ton/yr. rolling max(6/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (cleanup for 1R and 2R). 1R decommissioned in 2021
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of cig. Solids applied monthly average	Emission for this reporting period = 1R decommissioned in 2021	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	VOC emissions shall not exceed 47,946.4 lbs./month	Emission for this reporting period = 1R decommissioned in 2021	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R). 1R decommissioned in 2021

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as text methods, monitoring procedures, recordkeeping and reporting)
#023-2R	Sec. B table 3 from permit V-18-007	2R Coating Line	For the collection of controlled applicators <0.05 lb VOC/lb of ctg. applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-008	2R Coating Line	For the collection of controlled applicators <0.04 lb VOC/lb of ctg. Mat's applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of controlled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average	Maximum monthly ratio = 0.02a4 kg VOC/kg (7/22). Average monthly ratio = .023 kg VOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of ctg. Solids applied monthly average	Emission for this reporting period = Maximum monthly ratio = 0.132 kg VOC/kg (10/22). Average monthly ratio .114 kgVOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	VOC emissions shall not exceed 37,485.5 lbs./month	Emission for this reporting period = 279.4 lb/month max (6/2022) or 196.1 lb./month avg.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (2R).
#011 -1R #023-2R	B.[WebCtg].2.E.8 Includes: B.Table 2; B.Table 3; B.[WebCtg].5.B.7.i.a	1R Coating Line and 2R Coating Lines combined	Record: mass of each ctg. material. used each day	Not applicable for this condition	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	Verify that ratio of VOC emissions to coating solids is less than or equal to .019 and overall control efficiency is at least 90%	VOC emissions to solids ratio applied = 0.0023 max. (7/2022) and .0022 average Demonstrated control efficiency is 98.33%.	Recordkeeping and testing: records maintained for manufacturer's formulation data, raw material usage, and calculation to verify ratio of VOC input to solids applied. Records and Testing compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	daily compliance with emission standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period was 98.33%. Lowest monthly average 98.33%	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009 40 CFR Part 63 subpart JJJJ	3R Coating Line	Overall VOC control efficiency shall be at least 95% Monthly average	Overall Control over 12-month period was 98.33%.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	VOC emissions < or = 51.5 tons per 12-month rolling total.	Emissions for the period. With clean-up solvents included: 12-month rolling total 12.3 tons/yr. 12-month roll max 16.9 tons/yr. (1/2022). 14.6 Tons/yr. 12-month roll avg.	Record keeping: Emission calculation records maintained. Data was collected intermittently.
#022 - 3R	B.[WebCtj].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtj].5.B.7.i.a	3R Coating Line	Record: mass of each ctg. material used each day	Not applicable for this condition	Directly from production reporting -PLC
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtj].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Overall VOC control efficiency shall not be less than 98% for the entire 4R Coater Line standard of 0.02 lb. VOC emitted/lb. VOC	Lowest overall control over 12-month rolling period for 4R was 99.11% (2/2022). Lowest monthly avg. 99.06% (8/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtj].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Daily compliance with emission standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	4R always controlled Except water base primer coater - which was declared BACT = "no control" - emissions from primer coater are included in the daily calc. Lowest daily overall control average on 4R was 98.67% (on 1/15/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	VOC emissions shall not exceed 329 tpy (12-month rolling total)	Emissions for the period: Total 23.76 tons/yr. 12-month roll max (8/2022). 12-month roll average 23.20 tons/yr. With clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	MEK cleanup usage (emitted) shall not exceed 620 gallons per year.	MEK cleanup solvent emissions, rolling gallons max = 0 gal (2022) during this period. Average rolling for year 0 gallons, no MEK usage for 4R in 2022	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	IPA cleanup usage (emitted) shall not exceed 360 gallons per year.	IPA cleanup solvent emissions, rolling gallons max = 82.5 gal (2/2022) during this period. Average rolling for the year = 70.81 gallons	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	B. [WebCtg]. 2.E.8 Includes: B. Table 2; B. Table 3; B. [WebCtg]. 5.B. 7.1.a	4R Coater Line - Precoat 1, Precoat 2, and Functional	Record: mass of each ctg. material. used each day	Not applicable for this condition	Directly from production reporting -PLC
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:016	5R Coating Line	Emissions not to exceed 0.14 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Maximum monthly ratio = 0.0289 kg VOC/kg (10/22). Average monthly ratio = .0283 kg VOC/kg	-Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. -Records maintained. -This compliance data was collected intermittently.
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:017	5R Coating Line	12-month rolling sum of emissions not to exceed 200 tons VOC.	12-month rolling emissions = 16.23 TPY max month (10/22) 15.67 TPY avg. for year 15.95 TPY for yr. end 2022	-Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. -Records maintained. -This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	5R Coating Line	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator	Not Applicable	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use.
#050 - 5R	B.[WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtg].5.B.7.i.a	5R Coating Line	Record: mass of each cgt. material. used each day	427U Gray = 0.094lb. VOC/lb. solids Rule Line Blue = 0.135 lb. VOC/lb. solids Easel Ink = .131 lb. VOC/lb. solids per manufacture (3/28/2022).	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
6R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	6R	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator	Not Applicable	Directly from production reporting -PLC -Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
6R		6R	Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator	427U Gray = 0.094 lb. VOC/lb. solids Rule Line Blue = 0.135 lb. VOC/lb. solids per manufacture (3/28/2022)..	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.440	6R	Emissions not to exceed 0.05 lb VOC/lb VOC applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.441	6R	Emissions not to exceed 0.05 lb VOC/lb of coating materials applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.442	6R	Emissions not to exceed 0.20 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Total 2022 emissions Maximum monthly ratio = 0.0265 kg VOC/kg (11/22) Average monthly ratio = .0232 kg VOC/kg	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#011, #022, #023, #033	B.[WebCtg].1.B.1 B.[WebCtg].3.A; B.[WebCtg].3.B; B.[WebCtg].3.D; B.[WebCtg].4.B.1; B.[WebCtg].7.A; E.2.A.3	GP-C01 Thermal Oxidizers • RTO1 • TO1 • TO2 Thermal Oxidizers	Performance Test for each oxidizer • Determine control effect. • ESTABLISH: op. limits [3-hr avg. T]	Latest Performance Testing completed in 9/12/2018 (TO2) 9/11/2018 (for RTO)	Testing: Performance Test on thermal oxidizer
Thermal Oxidizers • RTO1 • TO1 • TO2			-Quarterly calibration of chart recorder, data logger, and thermocouples located in the combustion zone -Conducted a visual inspection of each thermocouple if redundant sensors are not used. - Validation check for new sensors.	Quarterly PM's completed for RTO, & TO2	TO1 decommissioned. Maintenance work order for annual replacement of all thermocouples. Maintenance work orders complete for quarterly calibration of thermocouples. Located in SAMS • Chart recorder is redundant to PLC archival • Data logger -- PLC -- is self-checking The compliance data is collected continuously, can be viewed thru 3M Cynthiana KQreports, and monthly environmental reports.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	Sec. B table 3 from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture Efficiency Monitoring with ΔP measurement, then:</p> <ul style="list-style-type: none"> LOCATE: P-sensor's in or as close as possible to a position that provides a representative measurement of the P-drop across each opening monitored Accuracy: more accurate of: 0.5 in. H₂O col. or 5% of true value Perform: initial calibration of each sensor per manuf's. specs. 	Quarterly PM's completed for 1R, 2R, 3R and 4R ovens	<p>Monitoring and record keeping: Pressure sensors installed, maintained, verified, and operated. Maintenance work orders complete for quarterly maintenance calibrations located in SAMs. The compliance data is collected continuously, can be viewed thru 3M Cynthia KQreports, and monthly environmental reports.</p>
1R,2R,3R,4R	Sec. B (5)(C), from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture System Monitoring Plan</p> <p>Site specific plan</p> <p>Identify the operating parameters and specific monitoring procedures.</p> <p>Make plan available</p> <p>Review plan annually</p>	Plan last reviewed 1/19/2023	Have a CSMP located on plant share drive and hard copy in 3M EHS office.
1R,4R	Sec. B (4)(A), Sec. E (3) (A) from permit V-18-009	Solvent Recovery Unit (SRU)	<p>Continuous recording of SRU organic concentration in inlet and outlet gas streams</p> <p>Conduct quarterly audits</p> <p>Must have valid data from at least 90% of the hours which the process is operated.</p>	<p>CMS downtime is noted on our quarterly S60.7 summary report which is submitted semi-annually. Have been above 95% for 2021</p>	<p>Monitoring and record keeping: CEMS installed, maintained, calibrated, and operated. The compliance data is collected continuously, and can be viewed thru 3M Proficy Portal, and monthly environmental report.</p> <p>Average less than limit would be flagged on monthly environmental reports. Valid data for $\geq 90\%$ of hrs. of coater operation</p>
1R,2R,3R,4R	Sec. B (5)(A), from permit V-18-009 63.10(b)(1)	Web Coating Lines	<p>Keep required records of information (including all reports and notifications) in a form suitable and readily available, retained for at least 5 years</p>	<p>Not applicable for this condition</p> <p>Follow record retention schedule of 10 years</p>	<p>Record keeping: maintenance records and performance evaluations kept. This compliance data is collected intermittently.</p>

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	Sec. B (5)(B), from permit V-18-009 63.447(b)	Web Coating Lines	Startup, Shutdown, & Malfunction Plan [SSM Plan] procedures for operating and maintaining the source during startup, shutdown, and malfunction • program of corrective action for malfunctioning process • air pollution control and monitoring equip. used to meet the standard	Plan last reviewed 3/30/2021	Have a SSM Plan located on plant share drive and hard copy in 3M EHS office. SSM Plan no longer required - On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(iv) 63.3320	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND: • response is NOT consistent with the SSM Plan, AND • EXCEED: ANY related emission. Limit Notify permit authority	Not applicable for this condition As of 7/9/2021 no longer require SSM Plan	Have a SSM plan, use excess emission/Malfunction Notification Form if needed (see below for any deviations listed this year) On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(viii)	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND is NOT adequately addressed by the SSM Plan REVISE: SSM Plan	Not applicable for this condition	On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	10(c)(7)	Web Coating Lines	RECORD: date, time [start/stop]; each instance of excess emissions and parameter monitoring exceedances during: • startups, shutdowns, and malfunctions • all other periods	Not applicable for this condition	TO thermocouples and the enclosure P monitors: PLC identifies all periods of 3-hr avg. < set pt. -- may be set inside the limit, meaning effectively not possible to have a parameter monitoring exceedance. The compliance data is collected continuously, can be viewed thru 3M Cynthiana KQreports, and monthly environmental reports.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	40 CFR 63.3350(e)(6)	Web Coating Lines	For each CPMS used by each: • APCD • capture system • bypass line Maintain parts for routine repair	Not applicable for this condition CPMS plan last reviewed 11/11/2021	3M Standard practice to maintain spare parts critical systems Maintain a CPMS (Continuous Parameter Monitoring System Plan)
1R,2R,3R,4R	40 CFR 63.3400©	Web Coating Lines	Submit MACT JJJJ Semi-annual Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
Primer Mix Tank	40 CFR Part 63, Subpart HFHHH Requirements	Web Coating Lines	MACT HFHHH this subpart for each individual stationary process vessel at an existing source, the permittee may elect to comply with a 5 weight percent HAP limit for process vessels at the affected source that are used to manufacture coatings with a HAP content of less than 0.05 kg per kg product subpart.	Not applicable for this condition	Use the alternative to complying with Table 1 by complying with the 5 weight percent HAP limit based on the SDS information.
1R,2R,3R,4R	B.[WebCtg].5.B.6	Web Coating Lines	Applies to each instance: CMS malfunction or inoperative, Except: zero (low-level) and high-level checks and high-level checks Record - date & time	Not applicable for this condition	<ul style="list-style-type: none"> • TO's: thermocouples on each TO -- faults and shuts down coater if loss of signal. • SRU: CE/MS -- if lose signal, alarm to operator • enclosures: <ul style="list-style-type: none"> » entire bay an enclosure: 1R, 2R, 4R, 5R -- ΔP oven vs. bay -- one mag. per oven zone -- lose any one signal, PLC shuts coater down » 3R -- dedicated coating enclosure -- ΔP enclosure vs. bay -- single mag. -- lose any signal, PLC shuts coater down Data archived by I historian database
1R,2R,3R,4R	B.6.B Includes: B.6.C	Web Coating Lines	Summit Quarterly VOC Exceedances Report [a] if: no exceedances during a quarter, then submit semiannually	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. Quarterly report if there is an exceedance. This compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
1R,2R,3R,4R	B.[WebC]g].6.A	Web Coating Lines	Submit semi-annual Excess Emissions and Monitoring Systems Performance Report,	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
HAP tanks and transfer racks (TR)	MACT EEEE Organic Liquids Distribution As Required by 40 CFR 63.2386	HAP tanks and transfer racks (TR)	Semiannual Compliance MACT EEEE Report. Submitted according to §63.2386 Organic Liquids Distribution.	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
1R,2R,3R4R, 5R, 6R PSB-1 PCT1 PCT2 PCT3	Sec. B (4)(A). from permit V-18-009	All sources covered by permit. Facility-wide	Report Source wide VOC and HAP emissions as part of the semiannual reporting	Max. Annual rolling VOCs emissions = 56.72 Tons (03/2022) Max. Annual rolling HAPs emissions = 5.95 Tons (04/2022) Average Annual rolling VOCs emissions = 54.78 Tons Average rolling HAPs emissions = 5.65 Tons	Reporting: Semiannual reports submitted by 7/30 and 1/30. This compliance data is collected intermittently. The permit tee shall include the monthly emissions from these facilities in the monthly emission totals for the respective coating lines"
15J	B.[15J].1 Includes: B.[15J].6 401 KAR 59:010	15J Polypropylene Line	Particulate filters shall be in place and functional at all times of operation. The filters shall be maintained and operated in accordance with the manufacturer's recommendations.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run
15J	B.[15J].2.1	15J Polypropylene Line	Each stack opacity: ≤ 20 % opacity Particulate limits = 2.34 lbs./hr. 2.61 lbs./hr. 5.69 lbs./hr.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
15J	401 KAR 59:010 Section(3)	15J Polypropylene Line	Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack no less than weekly and maintaining a log of the observations.	Have a log for weekly opacity observation. Log maintained though 2022 Weekly visual opacity observations for 15J film line no weeks missing in 2022	Have a log for weekly opacity observations
15J	401 KAR 52:020 Section 3(1)(b)	15J Polypropylene Line	When corrective actions are required due to an opacity exceedance as noted in Emission Limitations the permittee shall submit the following information from the control device inspection and repair log.	Not applicable for this condition	Currently in compliance and have no exceedances to report
15J	401 KAR 59:010 Section 3(2)	15J Polypropylene Line	Mass emission standard. For emissions from a control device or stack no person shall cause, suffer, allow or permit the emission into the open air of particulate matter from any affected facility which is in excess of the quantity specified in Appendix A to this administrative regulation	Not applicable for this condition	The source is considered to be in compliance when the emission points are operating and properly maintained according to the manufacturer's recommendations. Refer to Subsection 4. Monitoring Requirements. Have a log for weekly opacity observation. Have PM for the lower room silo and south rail dock baghouses.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].2B.[Boilers Tamp].2.	EP08 Two Cleaver Brooks Boilers Kewanne Boiler	Opacity: ≤ 20 % opacity EXCEPT: ≤ 40% opacity for ≤ 6 consecutive minutes during cleaning the firebox OR blowing soot.	Not applicable for this condition	The boiler is considered to be in compliance when firing natural gas.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].4.A,4C Includes: B.[Boilers/Cleav-Kew].5.A, 5.B,5C B.[Boilers Tamp].4.A, 5.A,5.B,5C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Record: for each fuel burned: • type • amount • date and time burned • lower heating value, • S-content	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-] B.[Boilers Tamp].401 KAR 59:015 sec 4(1)© & Sec 5(1)9c)	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PM < .40 lbs./MBTU SO2<1.67 lbs./MBTU	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E32	B.[Boilers Tamp].6C	Boilers • Tampella	SUBMIT: Quarterly NSPS Dc Report 30d after reporting period	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].3 B.[Boilers Tamp].3.C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PERFORMANCE TEST: each boiler within 6 mo. after using No. 2 fuel-oil: • PM • opacity • SO2	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
GP-E08 GP-E21 GP-E32	401 KAR 52:020 Section 3(1)(b)]	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Specific Recordkeeping Requirements: Keep a monthly record of the type and amount of each fuel used. Keep all records of regular maintenance and any necessary repairs to the equipment.	Not applicable for this condition	Have meters to record usage. The regular maintenance and necessary repairs are recorded through preventative maintenance in Maximo. A combustion efficiency PM is normally conducted quarterly but at less annually.
GP-E08 GP-E21 GP-E32	40 CFR 63.7540(a)(10)	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Conduct an annual tune-up of each boiler. Record CO2 readings before and after the tune-up of the boiler or process heater.	Not applicable for this condition	Currently conduct a internal and 3rd party audit on each boiler on a annual basis. The facility also has third party comes in quarterly to tune and measure the efficiency of each boiler.
GP-E08 GP-E21 GP-E32	40 CFR 63 Subpart DDDDD table 3	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Conduct a one-time energy assessment performed by a qualified energy assessor by 1/31/2016	Not applicable for this condition	Conducted a energy assessment 1/11/2016 - 1/15/2016, the plant was ISO 50001 certified in 2016. The plant also has a active energy reduction team on site
GP-E08 GP-E21 GP-E32	§63.7545(e) for MACT 5D	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Notification of Compliance Status Report for MACT DDDDD	Not applicable for this condition	Notification of Compliance Status Report for MACT DDDDD The facility complies with the required initial tune-up according to the procedures in §63.7540(e)(10)(i) through (vi), and the facility has had an energy assessment performed according to §63.7530(e).
T3 T4	B.[HAP Tanks].5.A MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	• records showing the dimensions of the vessel, AND • an analysis showing capacity	Not applicable for this condition T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011	Have drawings of tanks, showing the dimensions of the vessel, and capacity. T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011
T3 T4	B.[HAP Tanks].6 MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	SUBMIT: Semi-annual MACT EEEE Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
PSB-1	B.[Paint Booth].1. B.[Paint Booth].4.A. B.[Paint Booth].5.E.	PSB-1 Spray Paint Booth	Particulate filters in place anytime the spray booths are in operation. opacity: ≤ 20 % opacity PM: ≤ 2.34 lb./hr. Resistance to airflow [1] one per 8 hrs. of operation. Record each filter replacement	Not applicable for this condition	Fixed Monometer in place. Have a procedure and a log book in place to track filter changes and usages.
PSB-1	B.[Paint Booth].5.A. B.[Paint Booth].5.C.	PSB-1 Spray Paint Booth	For each coating, thinner, and clean-up solution used Record: • type • amount • Calculate VOC and HAP emissions,	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions
PSB-1	B.[Paint Booth].5.A. B.[Paint Booth].5.C.	PSB-1 Spray Paint Booth	Opacity checks weekly	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals no HAP emissions Rolling VOC Max .029 TPY (2/22) Rolling VOC .026 TPY Avg.	Operator logs usages in log book. The paint booth log was modified to include opacity checks at each use or weekly if used more than once in a week. Typically the paint booth is only operated once every few months.
PCT1 PCT2 PCT3	B.[Parts Clean].1.A. B.[Parts Clean].1.B.; B.[Parts Clean].1.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	1) Disposal of Waste solvent: do not dispose of so that >20 %wt. of the waste solvent can evaporate to atm. 2) Store waste solvent only in covered containers 3) Close covers if not handling parts in the cleaners 4) Drain cleaned parts at least 15s until dripping ceases 5) Spill response procedures	Not applicable for this condition (solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthia on 2/2009)	Operator log usages in log book, have SOP in place for cleaning tanks, also have emergency response procedures for spills.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
PCT1 PCT2 PCT3	B. [Parts Clean], 5.A. B. [Parts Clean], 5.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	Record monthly for each solvent used during the month: • type of solvent • VOC content • HAP content Calculate VOC emissions	12 mo. Max Rolling total for VOC = 2.32 tons (1/2022) 12 mo. Max Rolling total for HAP = 1.12 tons (1/2022) This is already included with each individual coating line	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals. Permit amended in R3 4/8/2009 "Use the site specific clean-up solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthiana on 2/2009".
Diesel Generator & Fire pump	40CFR 63.6602 and Table 2c	Emergency Engines	Change oil/filter Inspect air cleaner Inspect all hoses & belts 500hr or annually engine startup < 30 min	Not applicable for this condition.	Have a annual maintenance PM for these engines
Diesel Generator & Fire pump	40CFR 63.6640 (f)(1)(ii)	Emergency Engines	Maintenance Checks and testing limited to 100 hours per year & < 50 hours per year for non-emergency situations	Not applicable for this condition.	Maintenance checks are done once per week less than an hour each. Hours are recorded on Maintenance log store by each engine
Diesel Generator & Fire pump	40CFR 63.6625 (f)	Emergency Engines	Install a non-resettable hour meter	Not applicable for this condition.	Each engine has a hour meter which are recorded during PM's
Diesel Generator & Fire pump	40CFR 63.6655	Emergency Engines	Recordkeeping Keep records of notifications, malfunctions and maintenance for 5 years	Not applicable for this condition.	Keep records of all maintenance WO, malfunctions and notifications.
Facility-wide Insignificant activity	Section C 401 KAR 52:020 Sec 6 V-18-009	Insignificant Activities	Insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emission evaluation made	Not applicable for this condition.	Monthly inspection Logged for Sandblaster, Baler dust collector and dust collector for rubber
Facility-wide	Sec D.3	Facility-wide	Source Emissions Limit if VOC emission during any 12 month period exceed 225 ton permittee will track annual emissions weekly	Highest rolling VOC total 56.66 Ton 4/2022 Highest rolling HAP total 5.95 ton 4/2022	-Record keeping: emission calculations. This compliance data was collected Intermittently. Limit added with permit V-13-009 part of our Flexible Air permitting Rule to meet the source wide cap of 240 Tons of VOC's

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
Facility-wide	Attachment A Advance minor new source Review 401 KAR 52:020 Sec 18 Section 502 (b)(10) changes	Facility-wide	Notifications for changes prescribed in this section Notice 7 working days prior to change	Not applicable for this condition	Notice 7 working days prior to change 30 days after commencement date of max production rate within 180 days of start-up conduct a performance demonstration
Facility-wide	F.10	Facility-wide	Submit: Annual Emission Inventory	Have submitted last year for 2021	Within 30d of the date the KYEIS emission. survey is mailed
Facility-wide	F.09	Facility-wide	Submit: Annual Compliance Certification	Will submit on time for 2022	Use Compliance Certification Form (DEP 7007CC), due 1/30 of every year
Facility-wide	F.7.b.	Facility-wide	Applies if: emissions due to a malfunction, unplanned shutdown AND/OR ensuing startup are OR may be in excess of the	Not applicable for this condition	Notify Florence Regional Office if emissions due to a malfunction, unplanned shutdown and/or ensuing startup are or may be in excess of the standards
Facility-wide	F.5 F.6	Facility-wide	SUBMIT: Semi-Annual Title V Monitoring Report & Semi-Annual CEMS Monitoring Report	Have submitted Semi-annual reports for 2022	Submit with Semi-annual reports, 7/30 and 1/30 of every year

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Subject to Future Compliance Dates

10b) Emission Units Subject to Future Compliance Dates. *The following emission units will achieve compliance on a timely basis and maintain compliance with future compliance dates as they become applicable during the permit term. If additional space is required, reproduce this page as needed.*

Emission Unit/Permit ID#	Future Compliance Schedule	Emission Unit Description	Reason for Future Compliance Date
NA	NA		

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance

10c)(1) Emission Units Not in Continuous Compliance. The following emission units were not in continuous compliance with each permit term or condition and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or Requirement	Actual Emissions or Status of Requirement	The method used for determining compliance over the reporting period, and whether compliance was continuous or intermittent. (such as test methods, monitoring procedures, recordkeeping and reporting)

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance (continued)

10c)(2) Emission Units Not in Continuous Compliance. For the emission units and requirements listed in 10c)(1) that were not in continuous compliance since the last reporting period, state the duration, magnitude, and reason or reasons for non-compliance. Each row of 10c)(2) must relate to the corresponding row of 10c)(1). If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Description of duration, magnitude, and reason(s) for non-compliance and corrective steps taken or planned.

DEP7007DD

Division for Air Quality
 300 Sower Boulevard
 Frankfort, KY 40601
 (502) 564-3999

Insignificant Activities
 ___ Section DD.1: Table of Insignificant Activities
 ___ Section DD.2: Signature Block
 ___ Section DD.3: Notes, Comments, and Explanations

Source Name: 3M Cynthiana

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AD ID): 1752

Date: 3/17/2023

Section DD.1: Table of Insignificant Activities

*Identify each activity with a unique Insignificant Activity number (IA #); for example: 1, 2, 3... etc.

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
79	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
80	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
81	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
82	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
83	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
84	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
85	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
86	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
4	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
5	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
6	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 3	Categorical Exemption 20	See DD.3 Item 1
7	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 4	Categorical Exemption 20	See DD.3 Item 1

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
8	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 5	Categorical Exemption 20	See DD.3 Item 1
9	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
10	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
27	3D Printer Capacity: 10 kg	Metal X 3D Printer	Categorical Exemption 17	See DD.3 Item 2
28	Baler and Dust Collector Capacity: 6,000 lbs/hr	Recycling Baler and Dust Collector	401 KAR 52:020 Section 6	Calculated emissions included on Attachment A
51 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 100 gallons	2R - PC2 Station - 2R LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
52	Holding Tank Capacity: 50 gallons	2R - Functional Coat Station - 2R Adhesive Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
53 - Table 1B Unit to be Reclassified as IA	Cleaning Cart Capacity: 2.71 ft ²	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	401 KAR 52:020 Section 6	See DD.3 Item 3 and 10, Calculated emissions included on Attachment A
54 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 2.71 ft ²	2R - (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L	401 KAR 52:020 Section 6	See DD3.3 Item 3 and 11, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Die Cleaning Hood Capacity: Not applicable	2R - 2R Die Cleaning Hood	Non-emitting	See DD.3 Items 3, 5
55 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Drums Capacity: 30 gallons	2R - 2R IPA Cleaning Solution Drums	Categorical Exemption 2	See DD.3 Items 3, 6
56 - Table 1A Unit to be Reclassified as IA	Flametreater Capacity: 1.4 MMBtu/hr	3R - Flametreater	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Resin Compounding Capacity: Not Applicable	3R - 3R Bay - Resin Compounding	Non-emitting	See DD.3 Items 3, 7
57 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 2000 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
58	Holding Tank Capacity: 750 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
59 - Table 1B Unit to be Reclassified as IA	Powder Handling Capacity: 0.007 gr/scf	3R - 3R Bay - Supersack Powder Handling	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
60	Rubber Dust Collector Capacity: 2,000 lbs/hr	3R - 3R Bay - Rubber Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Maintenance Parts Washer Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
62 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 30 gallons	3R - 3R Bay - IPA Cleaning Solution Drums (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
63 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 2.5 gallons	4R - PC1 Station - Primer Holding Tank (25 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
64 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 68 gallons	4R - PC2 Station - LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
65	Cleaning Station Capacity: 30 gallons	4R - Adhesive Cleaning Station (IPA)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 1 Capacity: Not Applicable	Solvent Compounding - Room 161 - Compounding Area 1	Non-emitting	See DD.3 Items 3, 8
66 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Mix Tank	Categorical Exemption 2	See DD.3 Items 3, 6
67 - Table 1B Unit to be Reclassified as IA	Solids Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Solids Tank	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 2 Capacity: Not Applicable	Solvent Compounding - Room 162 - Compounding Area 2	Non-emitting	See DD.3 Items 3, 8
68 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 3,600 gallons	Solvent Compounding - Room 162 - Adhesive Mix Tank #2	Categorical Exemption 2	See DD.3 Items 3, 6
69 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 5,000 gallons	Solvent Compounding - Room 162 - Adhesive Storage Tank (5000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
70 - Table 1B Unit to be Reclassified as IA	Surge Tank Capacity: 100 gallons	Solvent Compounding - Room 162 - Heptane Surge Tank (Solvent)	Categorical Exemption 2	See DD.3 Items 3, 6
71 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,000 gallons	Solvent Compounding - Room 162 - LAB Storage Tank (2000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 3 Capacity: Not Applicable	Solvent Compounding - Room 163 - Compounding Area 3	Non-emitting	See DD.3 Items 3, 8
72 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 55 gallons	Solvent Compounding - Room 163 - MEK Cleaning Solution (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
73 - Table 1B Unit to be Reclassified as IA	Myers Tote Mixer Capacity: 275 gallons	Solvent Compounding - Room 163 - Myers Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
74 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
75 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
76 - Table 1B Unit to be Reclassified as IA	Cowles Mixer Capacity: 300 gallons	Waterbased Compounding - Cowles Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
77 - Table 1B Unit to be Reclassified as IA	Lightning Mixer Capacity: 55 gallons	Waterbased Compounding - Lightning Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
78	Dyno Mixer Capacity: 300 gallons	Waterbased Compounding - Dyno Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
45 - 15J-19 to be Reclassified as IA	Pellet Dryer, Beringer Air Dryer Capacity: 1,200 lbs/hr	15J - 15J-19 - Pellet Dryer, Beringer Air Dryer	Non-emitting	See DD.3 Items 3, 9

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
46	Extruder Capacity: 640 lbs/hr	15J - Coextruder 1	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
47	Extruder Capacity: 640 lbs/hr	15J - Coextruder 2	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
48	Extruder Capacity: 5,500 lbs/hr	15J - Metering Melt Extruders	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
49	Polypropylene Dust Collector Capacity: 0.63 lbs/hr	15J - Polypropylene Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
50	High Density Storage Tank Dust Collector Capacity: 2.08 lbs/hr	15J - High Density Storage Tank Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A

Section DD.2: Signature Block

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.

By: _____ Date: 3/17/2023

Authorized Signature _____ Title: Plant Director

Jason Orr _____ Title of Signatory

Section DD.3: Notes, Comments, and Explanations

1. Emission calculations are not provided for this unit because it is "equipment used for compression, molding, and injection of plastics" (Categorical Exemption 20).
2. Emission calculations are not provided for this unit because it is "equipment used exclusively for forging, pressing, drawing, stamping, spinning or extruding metals" (Categorical Exemption 17).
3. Prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's air permit (V-18-009) were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities.
4. Emissions calculations are not provided for this unit because emissions from this unit are negligible and would not exceed 5 tons per year for a regulated pollutant or 1,000 pounds of combined HAP.
5. Emission calculations are not provided for this unit because the emissions from die cleaning hood are associated with units operating in the area and accounted for at the individual unit.
6. Emission calculations are not provided for this unit because it is a "storage vessel having less than 10,567 gallons capacity that contains petroleum or organic liquids with a vapor pressure of 1.5 psia or less at storage temperature" (Categorical Exemption 2).
7. Emission calculations are not provided for this unit because the emissions from resin compounding are associated with units operating in the area and accounted for at the individual unit.
8. Emission calculations are not provided for this unit because the emissions from solvent compounding are associated with units operating in the area and accounted for at the individual unit.
9. Emission calculations are not provided for this unit because the emissions from pellet dryer, beringer air dryer are associated with units operating in the area and accounted for at the individual unit. The unit is electrically powered.
10. Unit was originally called "1R - 1R Primer Station - 1R/2R Cleaning Cart (MEK)" and is requested to be updated to "2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)" since the 1R Line has been decommissioned and the unit is now used with the 2R and 4R Lines.
11. Unit was originally called "2R - (PCT1) - 2R Cleaning Tank, 6"W x 65"L" and is requested to be updated to "2R - (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L" since the unit is used with the 2R and 4R Lines.

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpy)	Pollution Contr Eff (%)	Controlled PTE (tpy)
28	Recycling Baler and Dust Collector	PM	4.80E-04	2.10E-03	0	2.10E-03
		PM10	4.80E-04	2.10E-03	0	2.10E-03
		PM2.5	4.80E-04	2.10E-03	0	2.10E-03
53	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	VOC	0.217	0.949	0	0.949
54	2R - (PCT 1) - 2R/4R Cleaning Tank, 6"W x 65"L	VOC	0.217	0.949	0	0.949
56	3R - 3R Flametreater	PM	0.010	0.046	0	0.046
		PM10	0.010	0.046	0	0.046
		PM2.5	0.010	0.046	0	0.046
		VOC	0.008	0.033	0	0.033
		SO2	8.24E-04	3.61E-03	0	3.61E-03
		NOx	0.137	0.601	0	0.601
		CO	0.115	0.505	0	0.505
		Lead	6.86E-07	3.01E-06	0	3.01E-06
		Total HAP	2.59E-03	0.011	0	0.011
59	3R - 3R Bay - Supersack Powder Handling	PM	0.660	2.891	0	2.891
		PM10	0.146	0.638	0	0.638
		PM2.5	0.146	0.638	0	0.638
60	3R - 3R Bay - Rubber Dust Collector	PM	0.640	2.803	0	2.803
		PM10	0.640	2.803	0	2.803
		PM2.5	0.640	2.803	0	2.803
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Filter Cleaning Tank	VOC	0.464	2.031	0	2.031
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Maintenance Parts Washer	VOC	0.464	2.031	0	2.031
74	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	VOC	0.006	0.026	0	0.026
75	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	Total HAP	3.42E-05	1.50E-04	0	1.50E-04
		VOC	0.004	0.019	0	0.019
		Total HAP	3.42E-05	1.50E-04	0	1.50E-04

PTE = Potential to emit

DEP7007DD Insignificant Activities
Section DD.1 Table of Insignificant Activities - Attachment A

3M Cynthiana Title V Permit Renewal Application
 Permit # V-18-009

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpv)	Pollution Contr Eff (%)	Controlled PTE (tpv)
46	15J - Coextruder 1	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
47	15J - Coextruder 2	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
48	15J - Metering and Melt Extruder	PM	0.825	3.614	0	3.614
		PM10	0.825	3.614	0	3.614
		PM2.5	0.825	3.614	0	3.614
		VOC	1.051	4.601	0	4.601
		Total HAP	0.030	0.131	0	0.131
49	15J - Polypropylene Dust Collector	PM	0.006	0.028	0	0.028
		PM10	0.047	0.206	0	0.206
		PM2.5	0.047	0.206	0	0.206
50	15J - High Density Storage Tank Dust Collector	PM	0.021	0.092	0	0.092
		PM10	0.157	0.687	0	0.687
		PM2.5	0.157	0.687	0	0.687

PTE = Potential to emit

Division for Air Quality

300 Sower Boulevard
Frankfort, KY 40601
(502) 564-3999

DEP7007N

Source Emissions Profile

- ___ Section N.1: Emission Summary
- ___ Section N.2: Stack Information
- ___ Section N.3: Fugitive Informator
- ___ Section N.4: Notes, Comments, and Explanations

Additional Documentation

Complete DEP7007AI

Source Name: 3M Cynthiana
 KY EIS (AFS) #: 21-097-00021
 Permit #: V-18-009
 Agency Interest (AI) ID: 1752
 Date: 3/17/2023

N.1: Emission Summary

Emission Unit #	Emission Unit Name	Process ID	Process Name	Control Device Name	Control Device ID	Stack ID	Maximum Design Capacity (SCC Units/hour)	Pollutant	Uncontrolled Emission Factor (lb/SCC Units)	Emission Factor Source (e.g. AP-42, Stack Test, Mass Balance)	Capture Efficiency (%)	Control Efficiency (%)	Hourly Emissions		Annual Emissions	
													Uncontrolled Potential (lb/hr)	Controlled Potential (lb/hr)	Uncontrolled Potential (tons/yr)	Controlled Potential (tons/yr)
EU68	Corona Treater 1	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP09	52 kW	VOC	0.07 lb/kW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU69	Corona Treater 2	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP10	52 kW	VOC	0.07 lb/kW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU70	Coater Cleaning - Fugitive	3R	3R	N/A	N/A	N/A	0.41 lb/hr	VOC	1 lb/lb	Engineering Estimate	N/A	N/A	0.41	0.41	1.80	1.80
EU70	Coater Cleaning - Fugitive	3R	3R	N/A	N/A	N/A	0.30 lb/hr	Total HAP	2 lb/lb	Engineering Estimate	N/A	N/A	0.30	0.30	1.08	1.08
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	16.79 lb/hr	VOC	3 lb/lb	Engineering Estimate	N/A	N/A	16.79	16.79	73.55	73.55
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	2.33 lb/hr	Total HAP	4 lb/lb	Engineering Estimate	N/A	N/A	2.33	2.33	10.21	10.21

Section N.2: Stack Information

UTM Zone:

Stack ID	Identify all Emission Units (with Process ID) and Control Devices that Feed to Stack	Stack Physical Data			Stack UTM Coordinates		Stack Gas Stream Data		
		Equivalent Diameter (ft)	Height (ft)	Base Elevation (ft)	Northing (m)	Easting (m)	Flowrate (acfm)	Temperature (°F)	Exit Velocity (ft/sec)
EP09	Corona Treater 1	1.15	7.25	30	16S 736278.62	4250850.43	3480	68	32.82
EP10	Corona Treater 2	1.15	7.25	30	16S 736277.81	4250848.18	3480	68	32.82

Section N.3: Fugitive Information

UTM Zone:

Emission Unit #	Emission Unit Name	Process ID	Area Physical Data		Area UTM Coordinates		Area Release Data	
			Length of the X Side (ft)	Length of the Y Side (ft)	Northing (m)	Easting (m)	Release Temperature (°F)	Release Height (ft)
EU70	Coater Cleaning - Fugitive	3R	10	10	16S 4250880.73	736303.70	68	60
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	148	545	16S 4250894.00	736290	68	60

Section N.4: Notes, Comments, and Explanations

1. Corona treaters associated with the 15J Polypropylene Extrusion Line were originally permitted as a combined unit "Corona Treaters (2) 52 kwh each." 3M requests that the units be split into two individual emission units: EU 68 Corona Treater 1 and EU 15J10 Corona Treater 2. There is no increase in emissions as part of this change since the original calculations were based on the combined kW rating of the units.

2. 3M requests that fugitive emissions from cleaning of coater 3R with rags be included as a fugitive emission source: EU 70 Coater Cleaning. Emission data are based on historical solvent use associated with coater cleaning, with a safety factor applied. Engineering estimates assume that 15% of the solvent used is lost to the atmosphere and the remaining 85% of the solvent is disposed of as waste (e.g., solvent rags). The maximum design capacity in N.1 is based on the total VOC/HAP lost during cleaning, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.

3. 3M requests that fugitive emissions from equipment leaks associated with material piping for 2R, 3R, and 4R coating lines be included as a fugitive emission source: EU 71 Equipment Leaks. Emission data are based on the total number of components (e.g., valves, flange connectors, pumps, sampling connectors, pressure relief valves, open-ended lines, etc.), with a safety factor applied. Emission factors from Protocol for Equipment Leak Emission Estimates, EPA-453/R-95-017, Table 2-1 and maximum VOC content from material SDSs were used to calculate total VOC/HAP emission losses from components. The maximum design capacity in N.1 is based on the total VOC/HAP emission losses from components, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.

4. Data provided on N.3 for fugitives is based on the area of the facility where the fugitive emissions occur. Lengths X and Y are based on the overall physical footprint of the processes and the UTM coordinate is from the middle point of that area. Because the emissions are fugitive, it should be noted that there may be multiple release points since the emissions can be captured by various local exhausts and process area HVAC ventilation.

DEP7007V

Applicable Requirements and Compliance

Activities

Additional Documentation

___ Complete DEP7007AI

Division for Air Quality

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Frankfort, KY 40601
(502) 564-3999

- ___ Section V.1: Emission and Operating Limitation(s)
- ___ Section V.2: Monitoring Requirements
- ___ Section V.3: Recordkeeping Requirements
- ___ Section V.4: Reporting Requirements
- ___ Section V.5: Testing Requirements
- ___ Section V.6: Notes, Comments, and Explanations

Source Name: 3M Cynthiaiana

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AD) ID: 1752

Date: 3/17/2023

Section V.1: Emission and Operating Limitation(s)

Emission Unit #	Emission Unit Description	Applicable Regulation or Requirement	Pollutant	Emission Limit (if applicable)	Voluntary Emission Limit or Exemption (if applicable)	Operating Requirement or Limitation (if applicable)	Method of Determining Compliance with the Emission and Operating Requirement(s)
EU 68	Corona Treater 1	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Emission Unit #	Emission Unit Description	Applicable Regulation or Requirement	Pollutant	Emission Limit (if applicable)	Voluntary Emission Limit or Exemption (if applicable)	Operating Requirement or Limitation (if applicable)	Method of Determining Compliance with the Emission and Operating Requirement(s)
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Section V.2: Monitoring Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Monitored	Description of Monitoring
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 72	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.3: Recordkeeping Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Recorded	Description of Recordkeeping
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 70	Coater Cleaning - Fugitive	Total HAP	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.4: Reporting Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Reported	Description of Reporting
EU 68	Corona Treater 1	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 69	Corona Treater 2	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.

Section V.5: Testing Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Tested	Description of Testing
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.6: Notes, Comments, and Explanations



March 17, 2023

COPY 2

Electronic Submittal – Kentucky Business One Stop

Kentucky Division for Air Quality
Attn: Permit Support Section
300 Sower Boulevard
Frankfort, KY 40601

Subject: 3M Cynthiana Title V Operating Permit Renewal - Permit ID: V-18-009
KY EIS (AFS) #: 21-097-00021
Agency Interest (AI) ID: 1752

Dear Document Coordinator:

Enclosed are three copies of the Title V permit renewal application for the 3M Cynthiana facility located at 1309 New Lair Road in Cynthiana, KY, as required by 401 KAR 52:020, Section 5. In accordance with 401 KAR 52:020, Section 12, Item (4), an application for a permit renewal is required to be submitted no later than six months prior to the expiration of the current Title V permit (#V-18-009), which was issued on September 22, 2018 and expires on September 22, 2023. As required by Kentucky rules, this application is being submitted prior to March 22, 2023, six months prior to expiration.

Only information that is new or different from the information in the facility's current Title V is required to be included in the permit renewal application, pursuant to 401 KAR 52:020, Section 4, Item (2)(c). Since the issuance of the facility's current Title V permit, 3M Cynthiana has made numerous modifications classifiable as insignificant or trivial activities. Additionally, prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's current Title V permit were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities. These changes are noted on the enclosed DEP7007DD, DEP7007N, and DEP7007V forms.

A redline version of the current Title V permit is included to illustrate these requested changes, as well as updating requirements for units that have been decommissioned and revising permit language to incorporate updates made to referenced federal regulatory requirements.

If you have any questions or comments, please contact me at (651)-788-2580 or via email at rnavis@mmm.com.

Sincerely,

Ryan Navis
Senior Environmental Engineer

Division for Air Quality
 300 Sower Boulevard
 Frankfort, KY 40601
 (502) 564-3999

DEP7007AI
Additional Documentation
 Additional Documentation attached

Administrative Information

- ___ Section AI.1: Source Information
- ___ Section AI.2: Applicant Information
- ___ Section AI.3: Owner Information
- ___ Section AI.4: Type of Application
- ___ Section AI.5: Other Required Information
- ___ Section AI.6: Signature Block
- ___ Section AI.7: Notes, Comments, and Explanations

Source Name: 3M Cynthia

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

Section AI.1: Source Information

Physical Location Street: 1309 New Lair Road

Address: City: Cynthia County: Harrison Zip Code: 41031

Street or P.O. Box: 3M Center, Buidling 225-01 -N-22

Mailing Address: City: St. Paul State: MN Zip Code: 55144-1000

Standard Coordinates for Source Physical Location

Longitude: 84.294722 (decimal degrees)

Latitude: 38.375 (decimal degrees)

Primary (NAICS) Category: Stationary Product Manufacturing

Primary NAICS #: 322230

Classification (SIC) Category:	Stationary Products	Primary SIC #:	2678
Briefly discuss the type of business conducted at this site:			
Facility manufactures and coats pressure sensitive adhesives to make tapes and note pads.			
Description of Area Surrounding Source:	<input type="checkbox"/> Rural Area <input checked="" type="checkbox"/> Urban Area	<input type="checkbox"/> Industrial Park <input checked="" type="checkbox"/> Industrial Area	<input type="checkbox"/> Residential Area <input type="checkbox"/> Commercial Area
Approximate distance to nearest residence or commercial property:	500 ft	Property Area:	51.38 acres
		Is any part of the source located on federal land?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
		Number of Employees:	360
		Is this source portable?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
What other environmental permits or registrations does this source currently hold or need to obtain in Kentucky?			
NPDES/KPDES:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
Solid Waste:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
RCRA:	<input checked="" type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input type="checkbox"/> N/A
UST:	<input type="checkbox"/> Currently Hold	<input type="checkbox"/> Need	<input checked="" type="checkbox"/> N/A
Type of Regulated Waste Activity:	<input type="checkbox"/> Mixed Waste Generator <input type="checkbox"/> U.S. Importer of Hazardous Waste	<input checked="" type="checkbox"/> Generator <input type="checkbox"/> Transporter	<input type="checkbox"/> Recycler <input type="checkbox"/> Treatment/Storage/Disposal Facility <input type="checkbox"/> N/A

Section AI.2: Applicant Information

Applicant Name: 3M Company

Title: (if individual) N/A

Mailing Address: Street or P.O. Box: _____
 City: _____ State: _____ Zip Code: _____

Email: (if individual) _____

Phone: _____

Technical Contact

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22
 City: St. Paul State: MN Zip Code: 55144-1000

Email: rnavis@mmm.com

Phone: (651)-788-2580

Air Permit Contact for Source

Name: Ryan Navis

Title: Senior Environmental Engineer

Mailing Address: Street or P.O. Box: 3M Center, Building 225-01-N-22
 City: St. Paul State: MN Zip Code: 55144-1000

Email: rnavis@mmm.com

Phone: (651)-788-2580

Section AI.3: Owner Information

Owner same as applicant

Name:

Title:

Mailing Address:

Street or P.O. Box:

City:

State:

Zip Code:

Email:

Phone:

List names of owners and officers of the company who have an interest in the company of 5% or more.

Name

Position

For a list of current 3M Corporate Officers, please visit this webpage:

<http://investors.3m.com/governance/corporate-officers/default.aspx>

Section A1.4: Type of Application

Current Status: Title V Conditional Major State-Origin General Permit Registration None

Name Change Initial Registration Significant Revision Administrative Permit Amendment

Renewal Permit Revised Registration Minor Revision Initial Source-wide Operating Permit

502(b)(10)Change Extension Request Addition of New Facility Portable Plant Relocation Notice

Revision Off Permit Change Landfill Alternate Compliance Submittal Modification of Existing Facilities

Ownership Change Closure

Requested Status: Title V Conditional Major State-Origin PSD NSR Other: _____

Is the source requesting a limitation of potential emissions?

Pollutant:	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	Requested Limit:	Requested Limit:
<input type="checkbox"/> Particulate Matter			<input type="checkbox"/> Single HAP	_____
<input type="checkbox"/> Volatile Organic Compounds (VOC)			<input type="checkbox"/> Combined HAPs	_____
<input type="checkbox"/> Carbon Monoxide			<input type="checkbox"/> Air Toxics (40 CFR 68, Subpart F)	_____
<input type="checkbox"/> Nitrogen Oxides			<input type="checkbox"/> Carbon Dioxide	_____
<input type="checkbox"/> Sulfur Dioxide			<input type="checkbox"/> Greenhouse Gases (GHG)	_____
<input type="checkbox"/> Lead			<input type="checkbox"/> Other	_____

For New Construction:

Proposed Start Date of Construction: (MM/YYYY) _____

Proposed Operation Start-Up Date: (MM/YYYY) _____

For Modifications:

Proposed Start Date of Modification: (MM/YYYY) _____

Proposed Operation Start-Up Date: (MM/YYYY) _____

Applicant is seeking coverage under a permit shield. Yes No Identify any non-applicable requirements for which permit shield is sought on a separate attachment to the application.

Section AI.5 Other Required Information

Indicate the documents attached as part of this application:

- | | |
|--|--|
| <input type="checkbox"/> DEP7007A Indirect Heat Exchangers and Turbines | <input checked="" type="checkbox"/> DEP7007CC Compliance Certification |
| <input checked="" type="checkbox"/> DEP7007B Manufacturing or Processing Operations | <input checked="" type="checkbox"/> DEP7007DD Insignificant Activities |
| <input type="checkbox"/> DEP7007C Incinerators and Waste Burners | <input type="checkbox"/> DEP7007EE Internal Combustion Engines |
| <input type="checkbox"/> DEP7007F Episode Standby Plan | <input type="checkbox"/> DEP7007FF Secondary Aluminum Processing |
| <input type="checkbox"/> DEP7007J Volatile Liquid Storage | <input type="checkbox"/> DEP7007GG Control Equipment |
| <input type="checkbox"/> DEP7007K Surface Coating or Printing Operations | <input type="checkbox"/> DEP7007HH Haul Roads |
| <input type="checkbox"/> DEP7007L Mineral Processes | <input type="checkbox"/> Confidentiality Claim |
| <input type="checkbox"/> DEP7007M Metal Cleaning Degreasers | <input type="checkbox"/> Ownership Change Form |
| <input checked="" type="checkbox"/> DEP7007N Source Emissions Profile | <input type="checkbox"/> Secretary of State Certificate |
| <input type="checkbox"/> DEP7007P Perchloroethylene Dry Cleaning Systems | <input type="checkbox"/> Flowcharts or diagrams depicting process |
| <input type="checkbox"/> DEP7007R Emission Offset Credit | <input type="checkbox"/> Digital Line Graphs (DLG) files of buildings, roads, etc. |
| <input type="checkbox"/> DEP7007S Service Stations | <input type="checkbox"/> Site Map |
| <input type="checkbox"/> DEP7007T Metal Plating and Surface Treatment Operations | <input type="checkbox"/> Map or drawing depicting location of facility |
| <input checked="" type="checkbox"/> DEP7007V Applicable Requirements and Compliance Activities | <input type="checkbox"/> Safety Data Sheet (SDS) |
| <input type="checkbox"/> DEP7007Y Good Engineering Practice and Stack Height Determination | <input type="checkbox"/> Emergency Response Plan |
| <input type="checkbox"/> DEP7007AA Compliance Schedule for Non-complying Emission Units | <input type="checkbox"/> Other: _____ |
| <input type="checkbox"/> DEP7007BB Certified Progress Report | |

Section AI.6: Signature Block

I, the undersigned, hereby certify under penalty of law, that I am a responsible official*, and that I have personally examined, and am familiar with, the information submitted in this document and all its attachments. Based on my inquiry of those individuals with primary responsibility for obtaining the information, I certify that the information is on knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false or incomplete information, including the possibility of fine or imprisonment.


Authorized Signature

Jason Orr

Type or Printed Name of Signatory

3/17/2023

Date

Plant Director

Title of Signatory

*Responsible official as defined by 401 KAR 52:001.

Division for Air Quality

300 Sower Boulevard
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(502) 564-3999

DEP7007B

Manufacturing or Processing Operations

___ Section B.1: Process Information
___ Section B.2: Materials and Fuel Information
___ Section B.3: Notes, Comments, and Explanations

Additional Documentation

___ Complete DEP7007AI, DEP7007N,
DEP7007V, and DEP7007GG.
___ Attach a flow diagram
___ Attach SDS

Source Name: **3M Cynthiaiana**

KY EIS (AFS) #: **21-097-00021**

Permit #: **V-18-009**

Agency Interest (AI) ID: **1752**

Date: **3/17/2023**

Section B.1: Process Information

Emission Unit #	Emission Unit Name	Describe Emission Unit	Process ID	Process Name	Manufacturer	Model No.	Proposed/Actual Date of Construction Commencement (MM/YYYY)	Is the Process Continuous or Batch?	Number of Batches per 24 Hours (if applicable)	Hours per Batch (if applicable)
EU 68	Corona Treater 1	Corona treater	15J	15J Polypropylene Extrusion Line	Sofial Corona & Plasma	Series 60300	06/2002	Continuous	N/A	N/A
EU 69	Corona Treater 2	Corona treater	15J	15J Polypropylene Extrusion Line	Sofial Corona & Plasma	Series 9000	03/2014	Continuous	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Fugitive emissions from coater cleaning	3R	3R	N/A	N/A	10/2001	Batch	See B.3 Item 4	See B.3 Item 4
EU 71	Equipment Leaks - Fugitive	Fugitive emissions from piping components	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	08/1985	Continuous	N/A	N/A

Section B.2: Materials and Fuel Information

**Maximum yearly fuel usage rate only applies if applicant request operating restrictions through federally enforceable limitations.*

Emission Unit #	Emission Unit Name	Name of Raw Materials Input	Maximum Quantity of Each Raw Material Input		Total Process Weight Rate for Emission Unit (tons/hr)	Name of Finished Materials	Maximum Quantity of Each Finished Material Output		Fuel Type	Maximum Fuel Usage Rate		Sulfur Content (%)	Ash Content (%)
			(Specify Units/hr)	(Specify Units/hr)			(Specify Units/hr)	(Specify Units/hr)		(Specify Units/hr)	(Specify Units/hr)		
EU 68	Corona Treater 1	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Electricity	52	kW-h	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Solvent (contains VOC, HAP)	0.41	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Solvent (contains VOC, HAP)	16.79	lb/hr	See B.3 Item 5	See B.3 Item 5	See B.3 Item 5	N/A	N/A	N/A	N/A	N/A	N/A

Section B.3: Notes, Comments, and Explanations

<p>1. There are no control devices associated with the emission units listed in B.1, thus Form DEP7007 GG is not included in the permit application.</p>
<p>2. There are no new SDS associated with emission units listed in B.1.</p>
<p>3. There are no changes to the PFDs for the processes associated with the emission units listed in B.1.</p>
<p>4. The frequency of coater cleaning is variable depending on the types of coating material used and the duration of a product run.</p>
<p>5. Operation of the corona treaters and fugitive emissions from cleaning and equipment leaks do not directly correlate to a process weight or finished materials. These units by themselves do not manufacture a product, they are part of existing permitted process lines at the facility. For additional details on the processes the units are associated with and their emissions, see the DEP7007N Source Emissions Profile form included with this application.</p>

Division for Air Quality Submit to the Regional Office identified in your permit

DEP7007CC

Compliance Certification

- Section CC.1: Source Information
- Section CC.2: Signature Block
- Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit
- Section CC.4: Notes, Comments, and Explanations

Section CC.1: Source Information

1) Source Name 3M Cynthia 2) Agency Interest (AD) ID 1752

3) Source Location Address (street, city, state, zip) 1308 New Lair Road

4) Technical Contact (name, e-mail, phone #) Bryan Schroers, bgschroers@mmm.com, 859-569-4238

5) Permit Number(s) V-19-009 6) County Harrison 7) KY EIS (AFS) # 21- 097-00021

8) Submittal Information Are you certifying any requirement(s) as "not in continuous compliance?" Yes No [checked] What is the reporting period? 1/1/2022 TO 12/31/2022

Section CC.2: Signature Block

9) CERTIFICATION SIGNATURE

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE STATEMENTS AND INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.

BY: [Signature] AUTHORIZED SIGNATURE

Jason Orr

3/17/2023 DATE

Plant Director

TITLE OF SIGNATORY

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units in Continuous Compliance

10a) Emission Units in Continuous Compliance. The following emission units were in continuous compliance with each permit term or condition(s) and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	Daily compliance with emission standard of 0.05 lb. VOC emitted/lb. VOC input [95% overall control] Overall VOC control efficiency shall be at least 95% Monthly average	Lowest overall control over 12-month rolling period for 1R 1R has been decommissioned in 2021 Lowest overall control over 12-month rolling period for 2R was 99.53% (2022). Lowest monthly avg. for 2R was 99.53% (2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on 2R thermal oxidizer 8/12/2018 -Testing: Performance Test on 1R RTO 8/11/2018 -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DAFs, and CGAs.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines	daily compliance with emission standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period for 1R 1R has been decommissioned in 2021 Overall Control over 12-month period for 2R was 99.53%. Lowest daily overall control average on 2R was 99.53%	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DAFs, and CGAs. -Not applicable to waterbase primer and tinters which are not controlled.
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	VOC emissions < or = to 278.1 lb./hr. and 1218.0 tons/yr.;	1R has been decommissioned in 2021 Emission for this reporting period = .82lb/hr. average, .89lb/hr. max. monthly avg. (6/2022) and 1.19 tons/yr. highest 12-month rolling (2/2022) with clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#011 -1R #023-2R	Sec. B table 3 from permit V-18-009	1R Coating Line and 2R Coating Lines combined	Cleanup emissions < or = to 1.14 lb./hr. and 4.99 tons/yr.	Emissions for this reporting period = .08 lb./hr. average, .29lb/hr. max. monthly avg. (2/2022) and .136 ton/yr. rolling max(6/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (cleanup for 1R and 2R). 1R decommissioned in 2021
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of ctg. Solids applied monthly average	Emission for this reporting period = 1R decommissioned in 2021	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#011 -1R	Sec. B table 3 from permit V-18-009	1R Coating Line	VOC emissions shall not exceed 47,946.4 lbs./month	Emission for this reporting period = 1R decommissioned in 2021	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R). 1R decommissioned in 2021

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#023-2R	Sec. B table 3 from permit V-18-007	2R Coating Line	For the collection of controlled applicators <0.05 lb VOC/lb of ctg. applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-008	2R Coating Line	For the collection of controlled applicators <0.04 lb VOC/lb of ctg. Mat's applied monthly average	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of controlled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average	Maximum monthly ratio = 0.02a4 kg VOC/kg (7/22). Average monthly ratio = .023 kg VOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	For the collection of uncontrolled applicators <0.14 kg VOC/kg of ctg. Solids applied monthly average	Emission for this reporting Period = Maximum monthly ratio = 0.132 kg VOC/kg (10/22). Average monthly ratio .114 kgVOC/kg	Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. - This compliance data was collected intermittently.
#023-2R	Sec. B table 3 from permit V-18-009	2R Coating Line	VOC emissions shall not exceed 37,485.5 lbs./month	Emission for this reporting period = 279.4 lb./month max (6/2022) or 196.1 lb./month avg.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (2R).
#011 -1R #023-2R	B.[WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtg].5.B.7.i.a	1R Coating Line and 2R Coating Lines combined	Record: mass of each ctg. material. used each day	Not applicable for this condition	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Emissions were based upon hours tracked for each source (1R and 2R). 1R decommissioned in 2021
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	Verify that ratio of VOC emissions to coating solids is less than or equal to .019 and overall control efficiency is at least 90%	VOC emissions to solids ratio applied = 0.0023 max. (7/2022) and .0022 average Demonstrated control efficiency is 98.33%.	Recordkeeping and testing: records maintained for manufacturer's formulation data, raw material usage, and calculation to verify ratio of VOC input to solids applied. Records and Testing compliance data is collected intermittently.

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#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	daily compliance with emission. standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	Overall Control over 12-month period was 98.33%. Lowest monthly average 98.33%	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009 40 CFR Part 63 subpart JJJJ	3R Coating Line	Overall VOC control efficiency shall be at least 95% Monthly average	Overall Control over 12-month period was 98.33%.	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Latest Performance Test on RTO 9/11/2018
#022 - 3R	Sec. B table 3 from permit V-18-009	3R Coating Line	VOC emissions < or = 51.5 tons per 12-month rolling total.	Emissions for the period. With clean-up solvents included: 12-month rolling total 12.3 tons/yr. 12-month roll max 16.9 tons/yr. (1/2022). 14.6 Tons/yr. 12-month roll avg.	Record keeping: Emission calculation records maintained. Data was collected intermittently.
#022 - 3R	B.[WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B.[WebCtg].5.B.7.i.a	3R Coating Line	Record: mass of each ctg. material. used each day	Not applicable for this condition	Directly from production reporting -PLC
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtg].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Overall VOC control efficiency shall not be less than 98% for the entire 4R Coater Line standard of 0.02 lb. VOC emitted/lb. VOC	Lowest overall control over 12-month rolling period for 4R was 99.11% (2/2022). Lowest monthly avg. 99.06% (8/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#033 - 4R	D.4.A.3 Includes: D.4.C.2; B.[WebCtg].2.E.1; B. Table 3 from permit V-18-009	4R Coating Line	Daily compliance with emission. standard of 0.15 lb. VOC emitted/lb. VOC input [85% overall control]	4R always controlled Except water base primer coater - which was declared BACT = "no control" * emissions from primer coater are included in the daily calc. Lowest daily overall control average on 4R was 98.67% (on 1/15/2022)	-Record keeping: emission calculations. This compliance data was collected intermittently. -Compliance Demonstration By use of a Control Device -Testing: Performance Test on thermal oxidizer -CEMS: Calibrated CEMs to determine SRU removal efficiency. Annual RATA, quarterly DARs, and CGAs.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	VOC emissions shall not exceed 329 tpy (12-month rolling total)	Emissions for the period: Total 23.76 tons/yr. 12-month roll max (8/2022). 12-month roll average 23.20 tons/yr. With clean-up solvents included.	-Record keeping: emission calculations. This compliance data was collected intermittently.

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#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	MEK cleanup usage (emitted) shall not exceed 620 gallons per year.	MEK cleanup solvent emissions, rolling gallons max = 0 gal (2022) during this period. Average rolling for year 0 gallons, no MEK usage for 4R in 2022	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	Sec. B table 3 from permit V-18-009	4R Coater Line - Precoat 1, Precoat 2, and Functional	IPA cleanup usage (emitted) shall not exceed 360 gallons per year.	IPA cleanup solvent emissions, rolling gallons max = 82.5 gal (2/2022) during this period. Average rolling for the year = 70.81 gallons	Record keeping: records maintained for solvent dispensed and emissions. The compliance data is collected intermittently.
#033 - 4R	B. [WebCtj].2.E.8 Includes: B. Table 2; B. Table 3; B. [WebCtj].5.B.7.i.a	4R Coater Line - Precoat 1, Precoat 2, and Functional	Record: mass of each ctg. material, used each day	Not applicable for this condition	Directly from production reporting -PLC
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:016	5R Coating Line	Emissions not to exceed 0.14 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Maximum monthly ratio = 0.0289 kg VOC/kg (10/22). Average monthly ratio = .0283 kg VOC/kg	-Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. -Records maintained. -This compliance data was collected intermittently.
#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 51:017	5R Coating Line	12-month rolling sum of emissions not to exceed 200 tons VOC.	12-month rolling emissions = 16.23 TPY max month (10/22) 15.67 TPY avg. for year 15.95 TPY for yr. end 2022	-Compliance Demonstration for Compliance Coating -Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. -Records maintained. -This compliance data was collected intermittently.

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#050 - 5R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	5R Coating Line	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate.	Not Applicable	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use.
#050 - 5R	B. [WebCtg].2.E.8 Includes: B. Table 2; B. Table 3; B. [WebCtg].5.B.7.i.a	5R Coating Line	Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator Record: mass of each ckg. material. used each day	427U Gray = 0.094lb. VOC/lb. solids Rule Line Blue = 0.135 lb. VOC/lb. solids Easel Ink = .131 lb. VOC/lb. solids per manufacture (3/28/2022). This is done through production reporting to get the monthly totals.	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
6R	Sec. B table 3 from permit V-18-009 401 KAR 59:212	6R	Utilize a waterborne ink whose volatile portion consists of 75 volume percent water and 25 volume percent organic solvent OR Utilize inks which, excluding water, contain 60% or more by volume nonvolatile material as applied to the substrate. OR Utilize inks with an emission limit of .5 lb. VOC/lb. solids as delivered to the applicator	Not Applicable	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.

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6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.440	6R	Emissions not to exceed 0.05 lb VOC/lb VOC applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.441	6R	Emissions not to exceed 0.05 lb VOC/lb of coating materials applied based on weighted average for each calendar month, record	Not applicable for this condition	Compliance Demonstration for Compliance Coating Use For the collection of uncontrolled applicators <0.20 kg VOC/kg of ctg. Solids applied monthly average
6R	Sec. B table 3 from permit V-18-009 40 CFR Part 60 subpart RR 60.442	6R	Emissions not to exceed 0.20 kg VOC/kg of coating solids based on weighted average for each calendar month, record	Total 2022 emissions Maximum monthly ratio = 0.0265 kg VOC/kg (11/22) Average monthly ratio = .0232 kg VOC/kg	-Compliance Demonstration for Compliance Coating - Record keeping: Safety Data Sheets and/or manufacturer's formulation data and mass balance calculations with material use. - Records maintained. -This compliance data was collected intermittently.
#011, #022, #023, #033	B.[WebCtg].1.B.1 B.[WebCtg].3.A; B.[WebCtg].3.B; B.[WebCtg].3.D; B.[WebCtg].4.B.1; B.[WebCtg].7.A.; E.2.A.3	GP-C01 Thermal Oxidizers • RTO1 • TO1 • TO2	Performance Test for each oxidizer • Determine control effect. • ESTABLISH: op. limits [3-hr avg. T]	Latest Performance Testing completed in 9/12/2018 (TO2) 9/11/2018 (for RTO)	Testing: Performance Test on thermal oxidizer
Thermal Oxidizers • RTO1 • TO1 • TO2		Thermal Oxidizers	-Quarterly calibration of chart recorder, data logger, and thermocouples located in the combustion zone -Conducted a visual inspection of each thermocouple if redundant sensors are not used. - Validation check for new sensors.	Quarterly PM's completed for RTO, & TO2.	TO1 decommissioned. Maintenance work order for annual replacement of all thermocouples. Maintenance work orders complete for quarterly calibration of thermocouples. Located in SAMS • Chart recorder is redundant to PLC archival • Data logger -- PLC -- is self-checking The compliance data is collected continuously, can be viewed thru 3M Cynthiana KQreports, and monthly environmental reports.

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1R,2R,3R,4R	Sec. B table 3 from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture Efficiency Monitoring with ΔP measurement, then:</p> <ul style="list-style-type: none"> • LOCATE: P-sensor's in or as close as possible to a position that provides a representative measurement of the P-drop across each opening monitored • Accuracy: more accurate of: 0.5 in. H₂O col. or 5% of true value • Perform: initial calibration of each sensor per manuf's. specs. 	Quarterly PM's completed for 1R, 2R, 3R and 4R ovens	<p>Monitoring and record keeping: Pressure sensors installed, maintained, verified, and operated. Maintenance work orders complete for quarterly maintenance calibrations located in SAMs. The compliance data is collected continuously, can be viewed thru 3M Cynthia KQreports, and monthly environmental reports.</p>
1R,2R,3R,4R	Sec. B (5)(C). from permit V-18-009 63.10(b)(1)(ii)	Web Coating Lines	<p>Capture System Monitoring Plan</p> <p>Site specific plan</p> <p>Identify the operating parameters and specific monitoring procedures.</p> <p>Make plan available</p> <p>Review plan annually</p>	Plan last reviewed 1/19/2023	Have a CSMP located on plant share drive and hard copy in 3M EHS office.
1R,4R	Sec. B (4)(A). Sec. E (3) (A) from permit V-18-009	Solvent Recovery Unit (SRU)	<p>Continuous recording of SRU organic concentration in inlet and outlet gas streams</p> <p>Conduct quarterly audits</p> <p>Must have valid data from at least 90% of the hours which the process is operated.</p>	<p>CMS downtime is noted on our quarterly S60.7 summary report which is submitted semi-annually. Have been above 95% for 2021</p>	<p>Monitoring and record keeping: CEIMS installed, maintained, calibrated, and operated. The compliance data is collected continuously, and can be viewed thru 3M Proficy Portal, and monthly environmental report.</p> <p>Average less than limit would be flagged on monthly environmental reports. Valid data for \geq 90% of hrs. of coater operation</p>
1R,2R,3R,4R	Sec. B (5)(A). from permit V-18-009 63.10(b)(1)	Web Coating Lines	<p>Keep required records of information (including all reports and notifications) in a form suitable and readily available, retained for at least 5 years</p>	<p>Not applicable for this condition</p> <p>Follow record retention schedule of 10 years</p>	<p>Record keeping: maintenance records and performance evaluations kept. This compliance data is collected intermittently.</p>

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1R,2R,3R,4R	Sec. B (5)(B). from permit V-18-009 63.447(b)	Web Coating Lines	Startup, Shutdown, & Malfunction Plan (SSM Plan) procedures for operating and maintaining the source during startup, shutdown, and malfunction • program of corrective action for malfunctioning process • air pollution control and monitoring equip. used to meet the standard	Plan last reviewed 3/30/2021	Have a SSM Plan located on plant share drive and hard copy in 3M EHS office. SSM Plan no longer required - On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(iv) 63.3320	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND: • response is NOT consistent with the SSM Plan, AND • EXCEED: ANY related emission. Limit Notify permit authority	Not applicable for this condition As of 7/9/2021 no longer require SSM Plan	Have a SSM plan, use excess emission/Malfunction Notification Form if needed (see below for any deviations listed this year) On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	6(e)(3)(viii)	Web Coating Lines	APPLIES IF: a startup, shutdown, OR malfunction occurs, AND is NOT adequately addressed by the SSM Plan REVISE: SSM Plan	Not applicable for this condition	On and after July 9, 2021 the affected coating operation(s) must be in compliance with in the applicable emission limits in 63.3320 at all times, including periods of SSM. Any malfunction/excess emissions would be included with our emission calculations
1R,2R,3R,4R	10(c)(7)	Web Coating Lines	RECORD: date, time (start/stop); each instance of excess emissions and parameter monitoring exceedances during: • startups, shutdowns, and malfunctions • all other periods	Not applicable for this condition	TO thermocouples and the enclosure P monitors: PLC identifies all periods of 3-hr avg. < set pt. -- may be set inside the limit, meaning effectively not possible to have a parameter monitoring exceedance. The compliance data is collected continuously, can be viewed thru 3M Cynthiana KQreports, and monthly environmental reports.

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1R,2R,3R,4R	40 CFR 63.3350(e)(6)	Web Coating Lines	For each CPMS used by each: • APCD • capture system • bypass line Maintain parts for routine repair	Not applicable for this condition CPMS plan last reviewed 11/11/2021	3M Standard practice to maintain spare parts critical systems Maintain a CPMS (Continuous Parameter Monitoring System Plan)
1R,2R,3R,4R	40 CFR 63.3400©	Web Coating Lines	Submit MACT JJJJ Semi-annual Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
Primer Mix Tank	40 CFR Part 63, Subpart HHHHH Requirements	Web Coating Lines	MACT HHHHH Primer Mix Tank. this subpart for each individual stationary process vessel at an existing source, the permittee may elect to comply with a 5 weight percent HAP limit for process vessels at the affected source that are used to manufacture coatings with a HAP content of less than 0.05 kg per kg product subpart.	Not applicable for this condition	Use the alternative to complying with Table 1 by complying with the 5 weight percent HAP limit based on the SDS information.
1R,2R,3R,4R	B.[WebCtg].5.B.6	Web Coating Lines	Applies to each instance: CMS malfunction or inoperative, Except: zero (low-level) and high-level checks Record - date & time	Not applicable for this condition	<ul style="list-style-type: none"> • TO's: thermocouples on each TO -- faults and shuts down coater if loss of signal. • SRU: CEMS -- if lose signal, alarm to operator • enclosures: <ul style="list-style-type: none"> » entire bay an enclosure: 1R, 2R, 4R, 5R -- ΔP oven vs. bay -- one mag. per oven zone -- lose any one signal, PLC shuts coater down » 3R -- dedicated coating enclosure -- ΔP enclosure vs. bay -- single mag. -- lose any signal, PLC shuts coater down Data archived by I historian database
1R,2R,3R,4R	B.6.B Includes: B.6.C	Web Coating Lines	Submit Quarterly VOC Exceedances Report [a] If: no exceedances during a quarter, then submit semiannually	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. Quarterly report if there is an exceedance. This compliance data is collected intermittently.

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1R,2R,3R,4R	B.[WebC]g].6.A	Web Coating Lines	Submit semi-annual Excess Emissions and Monitoring Systems Performance Report.	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
HAP tanks and transfer racks (TR)	MACT EEEE Organic Liquids Distribution As Required by 40 CFR 63.2386	HAP tanks and transfer racks (TR)	Semiannual Compliance MACT EEEE Report. Submitted according to §63.2386 Organic Liquids Distribution.	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.
1R,2R,3R,4R, 5R, 6R PSB-1 PCT1 PCT2 PCT3	Sec. B (4)(A). from permit V-18-009	All sources covered by permit. Facility-wide	Report Source wide VOC and HAP emissions as part of the semiannual reporting	Max. Annual rolling VOCs emissions = 56.72 Tons (03/2022) Max. Annual rolling HAPs emissions = 5.95 Tons (04/2022) Average Annual rolling VOCs emissions = 54.78 Tons Average rolling HAPs emissions = 5.65 Tons	Reporting: Semiannual reports submitted by 7/30 and 1/30. This compliance data is collected intermittently. The permit tee shall include the monthly emissions from these facilities in the monthly emission totals for the respective coating lines*
15J	B.[15J].1 Includes: B.[15J].6 401 KAR 59:010	15J Polypropylene Line	Particulate filters shall be in place and functional at all times of operation. The filters shall be maintained and operated in accordance with the manufacturer's recommendations.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run
15J	B.[15J].2.1	15J Polypropylene Line	Each stack opacity: ≤ 20 % opacity Particulate limits = 2.34 lbs./hr. 2.61 lbs./hr. 5.69 lbs./hr.	Not applicable for this condition with filters in place	Filters must be in place or equipment will not run

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15J	401KAR 59:010 Section(3)	15J Polypropylene Line	Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack no less than weekly and maintaining a log of the observations.	Have a log for weekly opacity observation. Log maintained through 2022 Weekly visual opacity observations for 15J firm line no weeks missing in 2022	Have a log for weekly opacity observations
15J	401 KAR 52:020 Section 3(1)(b)	15J Polypropylene Line	When corrective actions are required due to an opacity exceedance as noted in Emission Limitations the permittee shall submit the following information from the control device inspection and repair log.	Not applicable for this condition	Currently in compliance and have no exceedances to report
15J	401 KAR 59:010 Section 3(2)	15J Polypropylene Line	Mass emission standard. For emissions from a control device or stack no person shall cause, suffer, allow or permit the emission into the open air of particulate matter from any affected facility which is in excess of the quantity specified in Appendix A to this administrative regulation	Not applicable for this condition	The source is considered to be in compliance when the emission points are operating and properly maintained according to the manufacturer's recommendations. Refer to Subsection 4. Monitoring Requirements. Have a log for weekly opacity observation. Have PM for the lower room sifo and south rail dock baghouses.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].2B.[Boilers Tamp].2.	EP08 Two Cleaver Brooks Boilers Kewanne Boiler	Opacity: ≤ 20 % opacity EXCEPT: ≤ 40% opacity for ≤ 6 consecutive min. in any 60-consecutive minutes during cleaning the firebox OR blowing soot.	Not applicable for this condition	The boiler is considered to be in compliance when firing natural gas.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].4.A,4C Includes: B.[Boilers/Cleav-Kew].5.A, 5.B,5C B.[Boilers Tamp].4.A, 5.A,5.B,5C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Record: for each fuel burned: • type • amount • date and time burned • lower heating value, • S-content	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-] B.[Boilers Tamp]. 401 KAR 59:015 sec 4(1)© & Sec 5(1)9c	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PM < .40 lbs./MBTU SO2<1.67 lbs./MBTU	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E32	B.[Boilers Tamp].6C	Boilers • Tampella	SUBMIT: Quarterly NSPS Dc Report 30d after reporting period	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.
GP-E08 GP-E21 GP-E32	B.[Boilers/Cleav-Kew].3 B.[Boilers Tamp].3.C	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	PERFORMANCE TEST: each boiler within 6 mo. after using No. 2 fuel-oil: • PM • opacity • SO2	Not applicable for this condition	Only required for fuel oil, using Natural Gas only.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
GP-E08 GP-E21 GP-E32	401 KAR 52:020 Section 3(1)(b)]	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Specific Recordkeeping Requirements: Keep a monthly record of the type and amount of each fuel used. Keep all records of regular maintenance and any necessary repairs to the equipment.	Not applicable for this condition	Have meters to record usage. The regular maintenance and necessary repairs are recorded through preventative maintenance in Maximo. A combustion efficiency PM is normally conducted quarterly but at less annually.
GP-E08 GP-E21 GP-E32	40CFR 63.7540(a)(10)	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Conduct an annual tune-up of each boiler. Record CO2 readings before and after the tune-up of the boiler or process heater.	Not applicable for this condition	Currently conduct a internal and 3rd party audit on each boiler on a annual basis. The facility also has third party comes in quarterly to tune and measure the efficiency of each boiler.
GP-E08 GP-E21 GP-E32	40CFR 63 Subpart DDDDD table 3	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Conduct a one-time energy assessment performed by a qualified energy assessor by 1/31/2016	Not applicable for this condition	Conducted a energy assessment 1/11/2016 - 1/15/2016, the plant was ISO 50001 certified in 2016. The plant also has a active energy reduction team on site
GP-E08 GP-E21 GP-E32	\$63.7545(e) for MACT 5D	Boilers • Cleaver Brooks (2) • Kewanne • Tampella	Notification of Compliance Status Report for MACT DDDDD	Not applicable for this condition	Notification of Compliance Status Report for MACT DDDDD The facility complies with the required initial tune-up according to the procedures in §63.7540(a)(10)(i) through (vi), and the facility has had an energy assessment performed according to §63.7530(e).
T3 T4	B,[HAP Tanks].5.A MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	records showing the dimensions of the vessel, AND an analysis showing capacity	Not applicable for this condition T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011	Have drawings of tanks, showing the dimensions of the vessel, and capacity. T3 MIBK tank is used for Toluene as of 12/22/2011 T4 Toluene has been decommissioned as of 12/22/2011
T3 T4	B,[HAP Tanks].6 MACT EEEE 40 CFR 63.2386	HAP Tanks • T3: MIBK • T4: Toluene	SUBMIT: Semi-annual MACT EEEE Compliance Report	Not applicable for this condition	Reporting: Semiannual reports submitted by 7/30 and 1/30 every year. This compliance data is collected intermittently.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
PSB-1	B.[Paint Booth].1. B.[Paint Booth].4.A. B.[Paint Booth].5.E.	PSB-1 Spray Paint Booth	Particulate filters in place anytime the spray booths are in operation. opacity: $\leq 20\%$ opacity P.M.; ≤ 2.34 lb./hr. Resistance to airflow [1] one per 8 hrs. of operation. Record each filter replacement	Not applicable for this condition	Fixed Monometer in place. Have a procedure and a log book in place to track filter changes and usages.
PSB-1	B.[Paint Booth].5.A. B.[Paint Booth].5.C.	PSB-1 Spray Paint Booth	For each coating, thinner, and clean-up solution used Record: • type • amount • Calculate VOC and HAP emissions,	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals and the 12-mo. rolling totals for VOC and HAP emissions
PSB-1	B.[Paint Booth].5.A. B.[Paint Booth].5.C.	PSB-1 Spray Paint Booth	Opacity checks weekly	Conduct opacity checks for paint booth at each use or weekly. Paint booth only used in Feb, March, April, May, June and December of 2022 no visible emissions noted during use	Operator logs usages in log book. The paint booth log was modified to include opacity checks at each use or weekly if used more than once in a week. Typically the paint booth is only operated once every few months.
PCT1 PCT2 PCT3	B.[Parts Clean].1.A. B.[Parts Clean].1.B.; B.[Parts Clean].1.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	1) Disposal of Waste solvent: do not dispose of so that $>20\%$ wt. of the waste solvent can evaporate to atm. 2) Store waste solvent only in covered containers 3) Close covers if not handling parts in the cleaners 4) Drain cleaned parts at least 15s until dripping ceases 5) Spill response procedures	Not applicable for this condition (solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthia on 2/2009)	Operator log usages in log book, have SOP in place for cleaning tanks, also have emergency response procedures for spills.

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
PCT1 PCT2 PCT3	B. [Parts Clean].5.A. B. [Parts Clean].5.C.	Parts Cleaning Tanks • PCT1 • PCT2 • PCT3	Record monthly for each solvent used during the month: • type of solvent • VOC content • HAP content Calculate VOC emissions	12 mo. Max Rolling total for VOC = 2.32 tons (1/2022) 12 mo. Max Rolling total for HAP = 1.12 tons (1/2022) This is already included with each individual coating line	Operator log usages in log book, have a spreadsheet to calculate VOC and HAP emission totals. Permit amended in R3 4/8/2009 "Use the site specific clean-up solvent emission factor of 15% as determined by the clean-up solvent tracking study performed at 3M Cynthia on 2/2009".
Diesel Generator & Fire pump	40CFR 63.6602 and Table2c	Emergency Engines	Change oil/filter Inspect air cleaner Inspect all hoses & belts 500hr or annually engine startup < 30 min	Not applicable for this condition.	Have a annual maintenance PM for these engines
Diesel Generator & Fire pump	40CFR 63.6640 (f)(1)(ii)	Emergency Engines	Maintenance Checks and testing limited to 100 hours per year & < 50 hours per year for non-emergency situations	Not applicable for this condition.	Maintenance checks are done once per week less than an hour each. Hours are recorded on Maintenance log store by each engine
Diesel Generator & Fire pump	40CFR 63.6625 (f)	Emergency Engines	Install a non-resettable hour meter	Not applicable for this condition.	Each engine has a hour meter which are recorded during PM's
Diesel Generator & Fire pump	40CFR 63.6655	Emergency Engines	Recordkeeping Keep records of notifications, malfunctions and maintenance for 5 years	Not applicable for this condition.	Keep records of all maintenance WO, malfunctions and notifications.
Facility-wide Insignificant activity	Section C 401 KAR 52:020 Sec 6 V-18-009	Insignificant Activities	Insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emission evaluation made	Not applicable for this condition.	Monthly inspection Logged for Sandblaster, Baler dust collector and dust collector for rubber
Facility-wide	Sec D.3	Facility-wide	Source Emissions Limit If VOC emission during any 12 month period exceed 225 ton permittee will track annual emissions weekly	Highest rolling VOC total 56.66 Ton 4/2022 Highest rolling HAP total 5.95 ton 4/2022	-Record keeping: emission calculations. This compliance data was collected intermittently. Limit added with permit V-13-009 part of our Flexible Air permitting Rule to meet the source wide cap of 240 Tons of VOC's

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or requirement	Actual Emissions or status of requirement	The method used for determining compliance over the reporting period, and whether the method provided continuous or intermittent data. (such as test methods, monitoring procedures, recordkeeping and reporting)
Facility-wide	Attachment A Advance minor new source Review 401 KAR 52:020 Sec 18 Section 502 (b)(10) changes	Facility-wide	Notifications for changes prescribed in this section Notice 7 working days prior to change	Not applicable for this condition	Notice 7 working days prior to change 30 days after commencement date of max production rate within 180 days of start-up conduct a performance demonstration
Facility-wide	F.10	Facility-wide	Submit: Annual Emission Inventory	Have submitted last year for 2021	Within 30d of the date the KYEIS emission. survey is mailed
Facility-wide	F.09	Facility-wide	Submit: Annual Compliance Certification	Will submit on time for 2022	Use Compliance Certification Form (DEP 7007CC), due 1/30 of every year
Facility-wide	F.7.b.	Facility-wide	Applies if: emissions due to a malfunction, unplanned shutdown AND/OR ensuing startup are OR may be in excess of the	Not applicable for this condition	Notify Florence Regional Office if emissions due to a malfunction, unplanned shutdown and/or ensuing startup are or may be in excess of the standards
Facility-wide	F.5 F.6	Facility-wide	SUBMIT: Semi-Annual Title V Monitoring Report & Semi-Annual CEMS Monitoring Report	Have submitted Semi-annual reports for 2022	Submit with Semi-annual reports, 7/30 and 1/30 of every year

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Subject to Future Compliance Dates

10b) Emission Units Subject to Future Compliance Dates. *The following emission units will achieve compliance on a timely basis and maintain compliance with future compliance dates as they become applicable during the permit term. If additional space is required, reproduce this page as needed.*

Emission Unit/Permit ID#	Future Compliance Schedule	Emission Unit Description	Reason for Future Compliance Date
NA	NA		

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance

10c)(1) Emission Units Not in Continuous Compliance. *The following emission units were not in continuous compliance with each permit term or condition and applicable requirements listed here, such as emission standards, emission control requirements, emission testing, court requirements, work practices, or enhanced monitoring, based on the compliance methods specified below. If additional space is required, reproduce this page as needed.*

Emission Unit/Permit ID#	Permit Term, Condition, or Applicable Regulation	Emission Unit Description	Permit Limit or Requirement	Actual Emissions or Status of Requirement	The method used for determining compliance over the reporting period, and whether compliance was continuous or intermittent. (such as test methods, monitoring procedures, recordkeeping and reporting)

Section CC.3: Identification of Emission Units & Each Term or Condition of the Permit

Emission Units Not in Continuous Compliance (continued)

10c)(2) Emission Units Not in Continuous Compliance. For the emission units and requirements listed in 10c)(1) that were not in continuous compliance since the last reporting period, state the duration, magnitude, and reason or reasons for non-compliance. Each row of 10c)(2) must relate to the corresponding row of 10c)(1). If additional space is required, reproduce this page as needed.

Emission Unit/Permit ID#	Description of duration, magnitude, and reason(s) for non-compliance and corrective steps taken or planned.

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 300 Sower Boulevard
 Frankfort, KY 40601
 (502) 564-3999

DEP7007DD

Insignificant Activities

- ___ Section DD.1: Table of Insignificant Activities
- ___ Section DD.2: Signature Block
- ___ Section DD.3: Notes, Comments, and Explanations

Source Name: 3M Cynthiana

KY EIS (AFS) #: 21- 097-00021

Permit #: V-18-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

Section DD.1: Table of Insignificant Activities

*Identify each activity with a unique Insignificant Activity number (IA #); for example: 1, 2, 3... etc.

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
79	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
80	Injection Molding Capacity: 270.5 lbs/hour	A07S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
81	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
82	Injection Molding Capacity: 235.3 lbs/hour	A13S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
83	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
84	Injection Molding Capacity: 336.5 lbs/hour	A06S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
85	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 1	Categorical Exemption 20	See DD.3 Item 1
86	Injection Molding Capacity: 235.3 lbs/hour	A15S Injection Molding 2	Categorical Exemption 20	See DD.3 Item 1
4	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
5	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
6	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 3	Categorical Exemption 20	See DD.3 Item 1
7	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 4	Categorical Exemption 20	See DD.3 Item 1

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
8	Cooling Tower Capacity: 102,000 gallons/hour	TCI-1322-75-1 Cooling Tower 5	Categorical Exemption 20	See DD.3 Item 1
9	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 1	Categorical Exemption 20	See DD.3 Item 1
10	Cooling Tower Capacity: 288,000 gallons/hour	TT T.360.319 Cooling Tower 2	Categorical Exemption 20	See DD.3 Item 1
27	3D Printer Capacity: 10 kg	Metal X 3D Printer	Categorical Exemption 17	See DD.3 Item 2
28	Baler and Dust Collector Capacity: 6,000 lbs/hr	Recycling Baler and Dust Collector	401 KAR 52:020 Section 6	Calculated emissions included on Attachment A
51 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 100 gallons	2R - PC2 Station - 2R LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
52	Holding Tank Capacity: 50 gallons	2R - Functional Coat Station - 2R Adhesive Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
53 - Table 1B Unit to be Reclassified as IA	Cleaning Cart Capacity: 2.71 ft ²	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	401 KAR 52:020 Section 6	See DD.3 Item 3 and 10, Calculated emissions included on Attachment A
54 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 2.71 ft ²	2R - (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L	401 KAR 52:020 Section 6	See DD.3 Item 3 and 11, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Die Cleaning Hood Capacity: Not applicable	2R - 2R Die Cleaning Hood	Non-emitting	See DD.3 Items 3, 5
55 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Drums Capacity: 30 gallons	2R - 2R IPA Cleaning Solution Drums	Categorical Exemption 2	See DD.3 Items 3, 6
56 - Table 1A Unit to be Reclassified as IA	Flametreater Capacity: 1.4 MMBtu/hr	3R - Flametreater	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
Table 1B Unit to be Reclassified as IA	Resin Compounding Capacity: Not Applicable	3R - 3R Bay - Resin Compounding	Non-emitting	See DD.3 Items 3, 7
57 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 2000 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
58	Holding Tank Capacity: 750 gallons	3R - 3R Bay - Resin Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
59 - Table 1B Unit to be Reclassified as IA	Powder Handling Capacity: 0.007 gr/scf	3R - 3R Bay - Supersack Powder Handling	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
60	Rubber Dust Collector Capacity: 2,000 lbs/hr	3R - 3R Bay - Rubber Dust Collector	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Cleaning Tank Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
61 - Table 1B Unit to be Reclassified as IA	Maintenance Parts Washer Capacity: 5.80 ft ²	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
62 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 30 gallons	3R - 3R Bay - IPA Cleaning Solution Drums (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
63 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 25 gallons	4R - PC1 Station - Primer Holding Tank (25 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
64 - Table 1B Unit to be Reclassified as IA	Holding Tank Capacity: 68 gallons	4R - PC2 Station - LAB Holding Tank	Categorical Exemption 2	See DD.3 Items 3, 6
65	Cleaning Station Capacity: 30 gallons	4R - Adhesive Cleaning Station (IPA)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 1 Capacity: Not Applicable	Solvent Compounding - Room 161 - Compounding Area 1	Non-emitting	See DD.3 Items 3, 8
66 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Mix Tank	Categorical Exemption 2	See DD.3 Items 3, 6
67 - Table 1B Unit to be Reclassified as IA	Solids Tank Capacity: 300 gallons	Solvent Compounding - Room 161 - LAB Solids Tank	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 2 Capacity: Not Applicable	Solvent Compounding - Room 162 - Compounding Area 2	Non-emitting	See DD.3 Items 3, 8
68 - Table 1B Unit to be Reclassified as IA	Mix Tank Capacity: 3,600 gallons	Solvent Compounding - Room 162 - Adhesive Mix Tank #2	Categorical Exemption 2	See DD.3 Items 3, 6
69 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 5,000 gallons	Solvent Compounding - Room 162 - Adhesive Storage Tank (5000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
70 - Table 1B Unit to be Reclassified as IA	Surge Tank Capacity: 100 gallons	Solvent Compounding - Room 162 - Heptane Surge Tank (Solvent)	Categorical Exemption 2	See DD.3 Items 3, 6
71 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,000 gallons	Solvent Compounding - Room 162 - LAB Storage Tank (2000 gallons)	Categorical Exemption 2	See DD.3 Items 3, 6
Table 1B Unit to be Reclassified as IA	Compounding Area 3 Capacity: Not Applicable	Solvent Compounding - Room 163 - Compounding Area 3	Non-emitting	See DD.3 Items 3, 8
72 - Table 1B Unit to be Reclassified as IA	Cleaning Solution Capacity: 55 gallons	Solvent Compounding - Room 163 - MEK Cleaning Solution (55 gallon drums)	Categorical Exemption 2	See DD.3 Items 3, 6
73 - Table 1B Unit to be Reclassified as IA	Myers Tote Mixer Capacity: 275 gallons	Solvent Compounding - Room 163 - Myers Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
74 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
75 - Table 1B Unit to be Reclassified as IA	Storage Tank Capacity: 2,300 gallons	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	401 KAR 52:020 Section 6	See DD.3 Item 3, Calculated emissions included on Attachment A
76 - Table 1B Unit to be Reclassified as IA	Cowles Mixer Capacity: 300 gallons	Waterbased Compounding - Cowles Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
77 - Table 1B Unit to be Reclassified as IA	Lightning Mixer Capacity: 55 gallons	Waterbased Compounding - Lightning Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
78	Dyno Mixer Capacity: 300 gallons	Waterbased Compounding - Dyno Mixer	Categorical Exemption 2	See DD.3 Items 3, 6
45 - 15J-19 to be Reclassified as IA	Pellet Dryer, Beringer Air Dryer Capacity: 1,200 lbs/hr	15J - 15J-19 - Pellet Dryer, Beringer Air Dryer	Non-emitting	See DD.3 Items 3, 9

Insignificant Activity #	Description of Activity including Rated Capacity	Serial Number or Other Unique Identifier	Applicable Regulation(s)	Calculated Emissions
46	Extruder Capacity: 640 lbs/hr	15J - Coextruder 1	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
47	Extruder Capacity: 640 lbs/hr	15J - Coextruder 2	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
48	Extruder Capacity: 5,500 lbs/hr	15J - Metering Melt Extruders	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
49	Polypropylene Dust Collector Capacity: 0.63 lbs/hr	15J - Polypropylene Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A
50	High Density Storage Tank Dust Collector Capacity: 2.08 lbs/hr	15J - High Density Storage Tank Dust Collector	401 KAR 52:020 Section 6	See DD3.3 Item 3, Calculated emissions included on Attachment A

Section DD.2: Signature Block

I, THE UNDERSIGNED, HEREBY CERTIFY UNDER PENALTY OF LAW, THAT I AM A RESPONSIBLE OFFICIAL, AND THAT I HAVE PERSONALLY EXAMINED, AND AM FAMILIAR WITH, THE INFORMATION SUBMITTED IN THIS DOCUMENT AND ALL ITS ATTACHMENTS. BASED ON MY INQUIRY OF THOSE INDIVIDUALS WITH PRIMARY RESPONSIBILITY FOR OBTAINING THE INFORMATION, I CERTIFY THAT THE INFORMATION IS ON KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE OR INCOMPLETE INFORMATION, INCLUDING THE POSSIBILITY OF FINE OR IMPRISONMENT.

Jason Orr
 Authorized Signature

3/17/2023

Date

By:

Jason Orr

Plant Director

Type/Print Name of Signatory

Title of Signatory

Section DD.3: Notes, Comments, and Explanations

1. Emission calculations are not provided for this unit because it is "equipment used for compression, molding, and injection of plastics" (Categorical Exemption 20).
2. Emission calculations are not provided for this unit because it is "equipment used exclusively for forging, pressing, drawing, stamping, spinning or extruding metals" (Categorical Exemption 17).
3. Prior to submitting this Title V permit renewal application, operations at 3M Cynthiana were reviewed to validate the historical potential to emit (PTE) calculations and insignificant activity (IA) classifications. As a result of this effort, numerous items listed in 3M Cynthiana's air permit (V-18-009) were found to qualify as insignificant activities. 3M requests that these items be removed as individual items in the permit and redesignated as insignificant activities.
4. Emissions calculations are not provided for this unit because emissions from this unit are negligible and would not exceed 5 tons per year for a regulated pollutant or 1,000 pounds of combined HAP.
5. Emission calculations are not provided for this unit because the emissions from die cleaning hood are associated with units operating in the area and accounted for at the individual unit.
6. Emission calculations are not provided for this unit because it is a "storage vessel having less than 10,567 gallons capacity that contains petroleum or organic liquids with a vapor pressure of 1.5 psia or less at storage temperature" (Categorical Exemption 2).
7. Emission calculations are not provided for this unit because the emissions from resin compounding are associated with units operating in the area and accounted for at the individual unit.
8. Emission calculations are not provided for this unit because the emissions from solvent compounding are associated with units operating in the area and accounted for at the individual unit.
9. Emission calculations are not provided for this unit because the emissions from pellet dryer, beringer air dryer are associated with units operating in the area and accounted for at the individual unit. The unit is electrically powered.
10. Unit was originally called "1R - 1R Primer Station - 1R/2R Cleaning Cart (MEK)" and is requested to be updated to "2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)" since the 1R Line has been decommissioned and the unit is now used with the 2R and 4R Lines.
11. Unit was originally called "2R - (PCT1) - 2R Cleaning Tank, 6"W x 65"L" and is requested to be updated to "2R - (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L" since the unit is used with the 2R and 4R Lines.

DEP7007DD Insignificant Activities
 Section DD.1 Table of Insignificant Activities - Attachment A

3M Cynthiaana Title V Permit Renewal Application
 Permit # V-18-009

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpy)	Pollution Contr Eff (%)	Controlled PTE (tpy)
28	Recycling Baler and Dust Collector	PM	4.80E-04	2.10E-03	0	2.10E-03
		PM10	4.80E-04	2.10E-03	0	2.10E-03
		PM2.5	4.80E-04	2.10E-03	0	2.10E-03
53	2R - 2R Primer Station - 2R/4R Cleaning Cart (MEK)	VOC	0.217	0.949	0	0.949
54	2R - (PCT 1) - 2R/4R Cleaning Tank, 6"W x 65"L	VOC	0.217	0.949	0	0.949
56	3R - 3R Flametreater	PM	0.010	0.046	0	0.046
		PM10	0.010	0.046	0	0.046
		PM2.5	0.010	0.046	0	0.046
		VOC	0.008	0.033	0	0.033
		SO2	8.24E-04	3.61E-03	0	3.61E-03
		NOx	0.137	0.601	0	0.601
		CO	0.115	0.505	0	0.505
		Lead	6.86E-07	3.01E-06	0	3.01E-06
		Total HAP	2.59E-03	0.011	0	0.011
59	3R - 3R Bay - Supersack Powder Handling	PM	0.660	2.891	0	2.891
		PM10	0.146	0.638	0	0.638
		PM2.5	0.146	0.638	0	0.638
60	3R - 3R Bay - Rubber Dust Collector	PM	0.640	2.803	0	2.803
		PM10	0.640	2.803	0	2.803
		PM2.5	0.640	2.803	0	2.803
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Filter Cleaning Tank	VOC	0.464	2.031	0	2.031
61	3R - (PCT3) - Two (2) 3R Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L - Maintenance Parts Washer	VOC	0.464	2.031	0	2.031
74	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	VOC	0.006	0.026	0	0.026
		Total HAP	3.42E-05	1.50E-04	0	1.50E-04
75	Solvent Compounding - Room 163 - 3R SPU LAB Storage Tank (2300 gallons)	VOC	0.004	0.019	0	0.019
		Total HAP	3.42E-05	1.50E-04	0	1.50E-04

PTE = Potential to emit

DEP7007DD Insignificant Activities
 Section DD.1 Table of Insignificant Activities - Attachment A

3M Cynthiana Title V Permit Renewal Application
 Permit # V-18-009

Insignificant Activity #	Serial Number or Other Unique Identifier	Pollutant Name	Uncontrolled PTE (lb/hr)	Uncontrolled PTE (tpv)	Pollution Contr Eff (%)	Controlled PTE (tpv)
46	15J - Coextruder 1	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
47	15J - Coextruder 2	PM	0.019	0.085	0	0.085
		PM10	0.019	0.085	0	0.085
		PM2.5	0.019	0.085	0	0.085
		VOC	0.067	0.292	0	0.292
		Total HAP	8.58E-04	3.76E-03	0	3.76E-03
48	15J - Metering and Melt Extruder	PM	0.825	3.614	0	3.614
		PM10	0.825	3.614	0	3.614
		PM2.5	0.825	3.614	0	3.614
		VOC	1.051	4.601	0	4.601
		Total HAP	0.030	0.131	0	0.131
49	15J - Polypropylene Dust Collector	PM	0.006	0.028	0	0.028
		PM10	0.047	0.206	0	0.206
		PM2.5	0.047	0.206	0	0.206
50	15J - High Density Storage Tank Dust Collector	PM	0.021	0.092	0	0.092
		PM10	0.157	0.687	0	0.687
		PM2.5	0.157	0.687	0	0.687

PTE = Potential to emit

Division for Air Quality

300 Sower Boulevard
Frankfort, KY 40601
(502) 564-3999

DEP7007N

Source Emissions Profile

- ___ Section N.1: Emission Summary
- ___ Section N.2: Stack Information
- ___ Section N.3: Fugitive Informator
- ___ Section N.4: Notes, Comments, and Explanations

Additional Documentation

___ Complete DEP7007AI

Source Name: 3M Cynthiaana

KY EIS (AFS) #: 21-097-00021

Permit #: V-16-009

Agency Interest (AI) ID: 1752

Date: 3/17/2023

N.1: Emission Summary

Emission Unit #	Emission Unit Name	Process ID	Process Name	Control Device Name	Control Device ID	Stack ID	Maximum Design Capacity (SCC Units/hour)	Pollutant	Uncontrolled Emission Factor (lb/SCC Units)	Emission Factor Source (e.g. AP-42, Stack Test, Mass Balance)	Capture Efficiency (%)	Control Efficiency (%)	Hourly Emissions		Annual Emissions	
													Uncontrolled Potential (lb/hr)	Controlled Potential (lb/hr)	Uncontrolled Potential (tons/yr)	Controlled Potential (tons/yr)
EU68	Corona Treater 1	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP09	52 kW	VOC	0.07 lb/kW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU69	Corona Treater 2	15J9	15J Polypropylene Extrusion Line	N/A	N/A	EP10	52 kW	VOC	0.07 lb/kW-hr	Manufacturer Information	N/A	N/A	3.8	3.8	16.63	16.63
EU70	Coater Cleaning - Fugitive	3R	3R	N/A	N/A	N/A	0.41 lb/hr	VOC	1 lb/lb	Engineering Estimate	N/A	N/A	0.41	0.41	1.80	1.80
EU70	Coater Cleaning - Fugitive	3R	3R	N/A	N/A	N/A	0.30 lb/hr	Total HAP	2 lb/lb	Engineering Estimate	N/A	N/A	0.30	0.30	1.08	1.08
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	16.79 lb/hr	VOC	3 lb/lb	Engineering Estimate	N/A	N/A	16.79	16.79	73.55	73.55
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	2R, 3R, 4R	N/A	N/A	N/A	2.33 lb/hr	Total HAP	4 lb/lb	Engineering Estimate	N/A	N/A	2.33	2.33	10.21	10.21

Section N.2: Stack Information

UTM Zone:

Stack ID	Identify all Emission Units (with Process ID) and Control Devices that Feed to Stack	Stack Physical Data			Stack UTM Coordinates		Stack Gas Stream Data		
		Equivalent Diameter (ft)	Height (ft)	Base Elevation (ft)	Northing (m)	Easting (m)	Flowrate (acfm)	Temperature (°F)	Exit Velocity (ft/sec)
EP09	Corona Treater 1	1.15	7.25	30	16S 736278.62	4250850.43	3480	68	32.82
EP10	Corona Treater 2	1.15	7.25	30	16S 736277.81	4250848.18	3480	68	32.82

Section N.3: Fugitive Information

UTM Zone:

Emission Unit #	Emission Unit Name	Process ID	Area Physical Data		Area UTM Coordinates		Area Release Data	
			Length of the X Side (ft)	Length of the Y Side (ft)	Northing (m)	Easting (m)	Release Temperature (°F)	Release Height (ft)
EU70	Coater Cleaning - Fugitive	3R	10	10	16S 4250880.73	736303.70	68	60
EU71	Equipment Leaks - Fugitive	2R, 3R, 4R	148	545	16S 4250894.00	736290	68	60

Section N.4: Notes, Comments, and Explanations

- 1. Corona treaters associated with the 15J Polypropylene Extrusion Line were originally permitted as a combined unit "Corona Treaters (2) 52 kwh each." 3M requests that the units be split into two individual emission units: EU 68 Corona Treater 1 and EU 15J10 Corona Treater 2. There is no increase in emissions as part of this change since the original calculations were based on the combined kW rating of the units.
- 2. 3M requests that fugitive emissions from cleaning of coater 3R with rags be included as a fugitive emission source: EU 70 Coater Cleaning. Emission data are based on historical solvent use associated with coater cleaning, with a safety factor applied. Engineering estimates assume that 15% of the solvent used is lost to the atmosphere and the remaining 85% of the solvent is disposed of as waste (e.g., solvent rags). The maximum design capacity in N.1 is based on the total VOC/HAP lost during cleaning, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.
- 3. 3M requests that fugitive emissions from equipment leaks associated with material piping for 2R, 3R, and 4R coating lines be included as a fugitive emission source: EU 71 Equipment Leaks. Emission data are based on the total number of components (e.g., valves, flange connectors, pumps, sampling connectors, pressure relief valves, open-ended lines, etc.), with a safety factor applied. Emission factors from Protocol for Equipment Leak Emission Estimates, EPA-453/R-95-017, Table 2-1 and maximum VOC content from material SDSs were used to calculate total VOC/HAP emission losses from components. The maximum design capacity in N.1 is based on the total VOC/HAP emission losses from components, multiplied by a factor of 1 lb/lb since all VOC/HAP lost would be emitted.
- 4. Data provided on N.3 for fugitives is based on the area of the facility where the fugitive emissions occur. Lengths X and Y are based on the overall physical footprint of the processes and the UTM coordinate is from the middle point of that area. Because the emissions are fugitive, it should be noted that there may be multiple release points since the emissions can be captured by various local exhausts and process area HVAC ventilation.

<p style="text-align: center;">DEP7007V</p> <p style="text-align: center;">Applicable Requirements and Compliance Activities</p> <p>___ Section V.1: Emission and Operating Limitation(s)</p> <p>___ Section V.2: Monitoring Requirements</p> <p>___ Section V.3: Recordkeeping Requirements</p> <p>___ Section V.4: Reporting Requirements</p> <p>___ Section V.5: Testing Requirements</p> <p>___ Section V.6: Notes, Comments, and Explanations</p>	<p style="text-align: center;">Additional Documentation</p> <p>___ Complete DEP7007AI</p>						
<p>Division for Air Quality</p> <p>300 Sower Boulevard Frankfort, KY 40601 (502) 564-3999</p>	<p>Source Name: 3M Cynthiana</p> <p>KY EIS (AFS) #: 21- 097-00021</p> <p>Permit #: V-18-009</p> <p>Agency Interest (AI) ID: 1752</p> <p>Date: 3/17/2023</p>						
<p>Section V.1: Emission and Operating Limitation(s)</p>							
<p>Emission Unit #</p>	<p>Emission Unit Description</p>	<p>Applicable Regulation or Requirement</p>	<p>Pollutant</p>	<p>Emission Limit (if applicable)</p>	<p>Voluntary Emission Limit or Exemption (if applicable)</p>	<p>Operating Requirement or Limitation (if applicable)</p>	<p>Method of Determining Compliance with the Emission and Operating Requirement(s)</p>
EU 68	Corona Treater 1	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 69	Corona Treater 2	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Emission Unit #	Emission Unit Description	Applicable Regulation or Requirement	Pollutant	Emission Limit (if applicable)	Voluntary Emission Limit or Exemption (if applicable)	Operating Requirement or Limitation (if applicable)	Method of Determining Compliance with the Emission and Operating Requirement(s)
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	VOC	N/A	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Continue to meet existing permit requirements	HAP	N/A	N/A	N/A	N/A

Section V.2: Monitoring Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Monitored	Description of Monitoring
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 72	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.3: Recordkeeping Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Recorded	Description of Recordkeeping
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 70	Coater Cleaning - Fugitive	Total HAP	Continue to meet existing permit requirements identified for 3R cleanups	Amount of solvent used as required by existing permit conditions	Amount of solvent used as required by existing permit conditions.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.4: Reporting Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Reported	Description of Reporting
EU 68	Corona Treater 1	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 69	Corona Treater 2	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	VOC emissions are included in annual emission reporting required by the existing permit.
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	HAP emissions are included in annual emission reporting required by the existing permit.

Section V.5: Testing Requirements

Emission Unit #	Emission Unit Description	Pollutant	Applicable Regulation or Requirement	Parameter Tested	Description of Testing
EU 68	Corona Treater 1	VOC	N/A	N/A	N/A
EU 69	Corona Treater 2	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	VOC	N/A	N/A	N/A
EU 70	Coater Cleaning - Fugitive	Total HAP	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	VOC	N/A	N/A	N/A
EU 71	Equipment Leaks - Fugitive	Total HAP	N/A	N/A	N/A

Section V.6: Notes, Comments, and Explanations

Commonwealth of Kentucky
Energy and Environment Cabinet
Department for Environmental Protection
Division for Air Quality
300 Sower Boulevard, 2nd Floor
Frankfort, Kentucky 40601
(502) 564-3999

Final

AIR QUALITY PERMIT
Issued under 401 KAR 52:020

Permittee Name: 3M Company
Mailing Address: 3M Center, Bldg. 224-5W-03, Saint Paul, MN
55144

Source Name: 3M Cynthiana
Mailing Address: 1309 New Lair Road
Cynthiana, KY 41031

Source Location: 1309 New Lair Road

Permit: V-18-009
Agency Interest: 1752
Activity: APE20180001
Review Type: Title V / Operating
Source ID: 21-097-00021

Regional Office: Florence Regional Office
8020 Veterans Memorial Drive, Suite 110
Florence, KY 41042
(859) 525-4923

County: Harrison

Application
Complete Date: March 6, 2018
Issuance Date: September 22, 2018
Expiration Date: September 22, 2023

Rick S. Shewekah for

Sean Alteri, Director
Division for Air Quality

Version 8/21/17

Permit Redline Color Key:

-  Language to be Removed/Updated
-  Unit reclassified from Permit to IA
-  Unit reclassified from Permit to Trivial Activity

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Remove. 1R line decommissioned.

	Permit type	Activity#	Complete Date	Issuance Date	Summary of Action
V-18-009	Renewal	APE20180001	3/6/2018	9/22/2018	Renewal Permit

SECTION A - PERMIT AUTHORIZATION

Pursuant to a duly submitted application the Kentucky Energy and Environment Cabinet (Cabinet) hereby authorizes the operation of the equipment described herein in accordance with the terms and conditions of this permit. This permit has been issued under the provisions of Kentucky Revised Statutes (KRS) Chapter 224 and regulations promulgated pursuant thereto.

The permittee shall not construct, reconstruct, or modify any affected facilities without first submitting a complete application and receiving a permit for the planned activity from the permitting authority, except as provided in this permit or in 401 KAR 52:020, Title V Permits.

Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by the Cabinet or any other federal, state, or local agency.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS

WEB COATING LINES – OVERVIEW

Table 1 – Applicator Emission Point Numbers and Descriptions

Line No.	Emission Pt No.	Coater No.	Description	Construction Commenced	Oven	Control Equipment
1R Line	EP37	1RT-1	Tinter 1	Oct-94	none	none
	EP56	1RT-2	Tinter 2	13-May-96	Infrared Oven	none
	EP61	1R1	Precoat 1	Oct-10	Oven 1R-O1	none
	EP11a	1R2	Precoat 2	Aug-85	Oven 1R-O2	RTO1
	EP11a	1R3	Functional Coat	Aug-85	Oven 1R-O3	RTO1/SRU1
2R Line	EP57	2RT-1	Tinter 1	13-May-96	none	none
	EP58	2RT-2	Tinter 2	13-May-96	none	none
	EP11b	2R1	Precoat 1	Aug-85	Oven 2R-O1	TO2
	EP11b	2R2	Precoat 2	Aug-85	Oven 2R-O2	TO2
	EP11b	2R3	Functional Coat	Aug-85	Oven 2R-O3	TO2
3R Line	EP62	3R1	LAB Station Coater	15-Oct-01	Oven 3R-O1	RTO1
	EP22	3R2	Hot Melt Applicator	5-Jun-89	none	none
	EP22	3R13	Hot Melt Applicator	15-Oct-01	none	none
4R Line	EP33	4RPC-1	Precoat 1	Jan-04	Oven 4R-O1	none
	EP34	4RPC-2	Precoat 2	11-Jul-91	Oven 4R-O2	RTO1
	EP35	4RF	Functional Coat	11-Jul-91	Oven 4R-O3	SRU1
5R Line	EP60	5R1A	Printing - Low VOC Ink	5-Oct-98	Infrared Oven	none
		5R1B	Printing - Low VOC Ink	5-Oct-98	Infrared Oven	none
	EP60	5R2	Low VOC Precoat 2	5-Oct-98	Oven 5R-O1	none
	EP60	5R3	Low VOC Precoat 3	5-Oct-98	none	none
	EP60	5RF	Low VOC Functional Coat	5-Oct-98	Oven 5R-O2	none
6R Line	EP61	1	Printing - Low VOC Ink	Nov-10	none	none
	EP61	2,3,4	Coating	Nov-10	none	none
	EP61	5	Coating	Nov-10	none	none
	EP61	6	Adhesive	Nov-10	N.G. Dryer	none

Remove redline units. Units have been decommissioned.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

Table 1A – Webcoating Line Ovens

Line	Manufacturer	Heating Method (natural gas, steam, electric)	Heat Input Capacity (MMBtu/hr)	Date Constructed
1R Burner Box	CE Air Preheater	Natural Gas	14.3	1986
1RT-2		Electric / Infrared	n/a	
1R Oven 1		Recoup TO Heat	n/a	
1R Oven 2		Recoup TO Heat	n/a	
1R Oven 3 Z1-3		Recoup TO Heat	n/a	
2R Burner Box	CE Air Preheater	Natural Gas	14.3	1986
2R Oven 1		Recoup TO Heat	n/a	
2R Oven 2		Recoup TO Heat	n/a	
2R Oven 3 Z1-3		Recoup TO Heat	n/a	
3R Oven	CE Air Preheater	Steam and Recouped TO heat		
3R Flametreater	Flynn	Natural Gas	1.4	2000
4R Oven 1	Thermo Electron	Natural Gas	3.85	1991
4R Oven 2	Thermo Electron	Natural Gas	3.85	1991
4R Oven 3 Zone1	Thermo Electron	Natural Gas	6.4	1991
4R Oven 3 Zone2	Thermo Electron	Natural Gas	6.4	1991
4R Oven 3 Zone3	Thermo Electron	Natural Gas	5.175	1991
4R Oven 3 Zone4	Thermo Electron	Natural Gas	3.85	1991
4R Oven 3 Zone5	Thermo Electron	Natural Gas	3.85	1991
5R1A		Electric / Infrared	n/a	1998
5R1B		Electric / Infrared	n/a	1998
5R Oven 2	Megtec	Natural Gas	5.175	1998
5R Oven 3 Z1	Megtec	Natural Gas	3.85	1998
5R Oven 3 Z2	Megtec	Natural Gas	3.85	1998
5R Oven 3 Z3	Megtec	Natural Gas	3.85	1998
6R Oven		Natural Gas	1.83	2010

Remove redline units. Units have been decommissioned.

Unit requested to be reclassified as an insignificant activity, as noted on DEP7007DD Insignificant Activities form.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

Remove 1R. The line has been decommissioned.



Control Equipment:

RTO1 – Regenerative Thermal Oxidizer #1 – Controls applicators on Line ~~1R~~, 3R, and 4R

Advanced Environmental Systems, Inc., ThermGen 85202J1
Natural Gas Fired (6.0 MMBtu/hr)
Installed: September 2003, Modified 2011

TO2 – Recuperative Thermal Oxidizer #2 – Applicators 2R1, 2R2, and 2R3

CE Air Preheater, 29.9 TRG 48
Natural Gas Fired (26.25 MMBtu/hr)
Installed: July 1985

SRU1 – Solvent Recovery Unit #1

3 Chamber Carbon Adsorption System
CEMS - Rosemount Analytical Flame Ionization Detectors at inlet and outlet
Installed: 1991

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

APPLICABLE REGULATIONS:

The following regulations apply to the web coating lines ~~1R~~, 2R, 3R, 4R, 5R, and 6R according to Table 2.

Remove 1R. The line has been decommissioned.

401 KAR 60:005 Section 2(2)(xx), 40 C.F.R. 60.440 to 60.447 (Subpart RR), Standards of Performance for Pressure Sensitive Tape and Label Surface Coating Operations

401 KAR 63:002 Section 2(4)(ppp), 40 C.F.R. 63.3280 to 63.3420, Tables 1 to 2 (Subpart JJJJ), National Emission Standards for Hazardous Air Pollutants: Paper and Other Web Coating

~~**401 KAR 63:002 Section 2(4)(mmmm)**, 40 C.F.R. 63.7980 to 63.8105, Tables 1 to 10 (Subpart HHHHH), National Emission Standards for Hazardous Air Pollutants: Miscellaneous Coating Manufacturing~~

401 KAR 51:017, Prevention of significant deterioration of air quality

401 KAR 59:210, New fabric, vinyl and paper surface coating operations

401 KAR 59:212, New graphic arts facilities using rotogravure and flexography

Request MACT 5H language be removed since MACT 5H does not apply to coating lines and MACT 5H requirements associated with regulated units are included elsewhere in the permit (see Solvent Compounding).

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

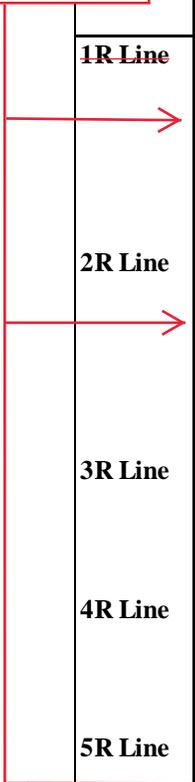
WEB COATING LINES – OVERVIEW

APPLICABLE REGULATIONS: (Continued)

Table 2 – Applicable Regulations

Line No.	Emission Pt No.	Coater No.	Description	Construction Commenced	Applicable Regulations				
					40 CFR Part 60, Subpart RR	40 CFR Part 63, Subpart JJJ	401 KAR 51:017	401 KAR 59:210	401 KAR 59:212
1R Line	EP37	1RT-1	Tinter 1	Oct-94	y	y	y	y	n
	EP56	1RT-2	Tinter 2	13-May-96	y	y	y	y	n
	EP61	1R1	Precoat 1	Oct-10	y	y	y	y	n
	EP11a	1R2	Precoat 2	Aug-85	y	y	y	y	n
	EP11a	1R3	Functional Coat	Aug-85	y	y	y	y	n
2R Line	EP57	2RT-1	Tinter 1	13-May-96	y	y	y	y	n
	EP58	2RT-2	Tinter 2	13-May-96	y	y	y	y	n
	EP11b	2R1	Precoat 1	Aug-85	y	y	y	y	n
	EP11b	2R2	Precoat 2	Aug-85	y	y	y	y	n
	EP11b	2R3	Functional Coat	Aug-85	y	y	y	y	n
3R Line	EP62	3R1	LAB Station Coater	15-Oct-01	y	y	y	y	n
	EP22	3R2	Hot Melt Applicator	5-Jun-89	y	y	y	y	n
	EP22	3R13	Hot Melt Applicator	15-Oct-01	y	y	y	y	n
4R Line	EP33	4RPC-1	Precoat 1	Jan-04	y	y	y	y	n
	EP34	4RPC-2	Precoat 2	11-Jul-91	y	y	y	y	n
	EP35	4RF	Functional Coat	11-Jul-91	y	y	y	y	n
5R Line	EP60	5R1A	Printing	5-Oct-98	y	y	y	n	y
		5R1B	Printing	5-Oct-98	y	y	y	n	y
	EP60	5R2	Precoat 2	5-Oct-98	y	y	y	n	y
	EP60	5R3	Precoat 3	5-Oct-98	y	y	y	n	y
	EP60	5RF	Functional Coat	5-Oct-98	y	y	y	n	y
6R Line	EP61	1	Printing	Nov-10	y	y	n	n	y
	EP61	2,3,4	Coating	Nov-10	y	y	n	n	y
	EP61	5	Coating	Nov-10	y	y	n	n	y
	EP61	6	Adhesive	Nov-10	y	y	n	n	y

Remove redline units. Units have been decommissioned.



SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

Table 3 – Emission Limitations Summary

1R Line Requirements to be removed. Line is decommissioned.

	401 KAR 51:017 (BACT)	401 KAR 59:210	401 KAR 59:212	40 CFR Part 60, Subpart RR (NSPS)	40 CFR Part 63, Subpart JJJJ (MACT)
1R	<ul style="list-style-type: none"> for controlled applicators: subsumed by MACT limit of 95% overall control for the collection of uncontrolled applicators: ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average total VOC emissions: $\leq 47,946.4$ lbs/mo., monthly total 	<ul style="list-style-type: none"> for all applicators, considered individually, or as a single collection, or as any combination thereof [3]: <ul style="list-style-type: none"> VOC control efficiency: $\geq 85\%$, daily average, Or VOC content of coatings: < 2.9 lb/gal, daily average 	NA	subsumed by MACT JJJJ	<ul style="list-style-type: none"> for all controlled applicators, considered individually, as a single collection, or as any combination thereof, the following as a monthly average [3]: <ul style="list-style-type: none"> ≤ 0.05 lb VOC per lb VOC applied [4], Or ≤ 0.04 lb VOC per lb ctg. mat's applied, Or ≤ 0.20 lb VOC per lb ctg. solids applied for uncontrolled applicators: subsumed by BACT limit of ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average
2R	<ul style="list-style-type: none"> for controlled applicators: subsumed by MACT limit of 95% overall control for the collection of uncontrolled applicators: ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average total VOC emissions: $\leq 37,485.5$ lbs/mo., monthly total 	<ul style="list-style-type: none"> for all applicators, considered individually, or as a single collection, or as any combination thereof [3]: <ul style="list-style-type: none"> VOC control efficiency: $\geq 85\%$, daily average, Or VOC content of coatings: < 2.9 lb/gal, daily average 	NA	subsumed by MACT JJJJ	<ul style="list-style-type: none"> for all controlled applicators, considered individually, as a single collection, or as any combination thereof, the following as a monthly average [3]: <ul style="list-style-type: none"> ≤ 0.05 lb VOC per lb VOC applied [4], Or ≤ 0.04 lb VOC per lb ctg. mat's applied, Or ≤ 0.20 lb VOC per lb ctg. solids applied for uncontrolled applicators: subsumed by BACT limit of ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average
Combined applicators: 1R1, 1R2, 1R3, 2R1, 2R2, 2R3	<ul style="list-style-type: none"> from coating: ≤ 278.1 lbs/hr VOC emissions, monthly average from cleanup solvents: ≤ 1.14 lbs/hr VOC emissions, monthly average from cleanup solvents: ≤ 4.99 tpy VOC emissions, 12-mo. rolling total 	NA	NA	NA	NA
3R	<ul style="list-style-type: none"> ≤ 0.019 kg VOC/kg of ctg. solids applied, monthly average ≤ 51.5 tpy, 12-mo. rolling total 	<ul style="list-style-type: none"> for all applicators, considered individually, or as a single collection, or as any combination thereof [3]: <ul style="list-style-type: none"> VOC control efficiency: $\geq 85\%$, daily average, Or VOC content of coatings: < 2.9 lb/gal, daily average 	NA	subsumed by MACT JJJJ	subsumed by BACT limit of ≤ 0.019 kg VOC/kg of ctg. solids applied, monthly average
4R	<ul style="list-style-type: none"> either of the following: <ul style="list-style-type: none"> $\geq 98\%$ overall control of VOC emissions, monthly basis, Or ≤ 0.08 kg VOC/kg of ctg. solids applied, monthly average usage of MEK for cleanup: ≤ 620 gal/yr, 12-mo. rolling total usage of IPA for cleanup: ≤ 360 gal/yr, 12-mo. rolling total 	<ul style="list-style-type: none"> for all applicators, considered individually, or as a single collection, or as any combination thereof [3]: <ul style="list-style-type: none"> VOC control efficiency: $\geq 85\%$, daily average, Or VOC content of coatings: < 2.9 lb/gal, daily average 	NA	subsumed by MACT JJJJ	subsumed by BACT control limit of 98% control, or the ≤ 0.08 kg VOC/kg of ctg. solids applied emission limit, monthly average
5R	<ul style="list-style-type: none"> ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average ≤ 200 tpy, 12-mo. rolling total 	NA	<ul style="list-style-type: none"> for each applicator, utilize inks which meet any of the following criteria ... <ul style="list-style-type: none"> volatile portion $\geq 75\%$ v/v water and $\leq 25\%$ v/v organic solvent, Or $\geq 60\%$ v/v nonvolatile material (excluding water), as applied to the substrate, Or ≤ 0.5 lb VOC/lb solids as delivered to the applicator 	subsumed by MACT JJJJ	subsumed by BACT limit of ≤ 0.14 kg VOC/kg of ctg. solids applied, monthly average
6R	NA	NA	<ul style="list-style-type: none"> for each applicator, utilize inks which meet any of the following criteria ... <ul style="list-style-type: none"> volatile portion $\geq 75\%$ v/v water and $\leq 25\%$ v/v organic solvent, Or $\geq 60\%$ v/v nonvolatile material (excluding water), as applied to the substrate, Or ≤ 0.5 lb VOC/lb solids as delivered to the applicator 	subsumed by MACT JJJJ	<ul style="list-style-type: none"> for all applicators, considered individually, as a single collection, or as any combination thereof, the following as a monthly average [3]: <ul style="list-style-type: none"> ≤ 0.05 lb VOC per lb VOC applied [4], Or ≤ 0.04 lb VOC per lb ctg. mat's applied, Or ≤ 0.20 lb VOC per lb ctg. solids applied

Request redline language be updated to "usage of solvent for clean up: ≤ 980 gal/yr, 12-mo. rolling total" to remove chemical specific references

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

1. Operating Limitations:

40 CFR Part 63, Subpart JJJJ

- (1) For thermal oxidizers and capture systems which are not permanent total enclosures, the permittee must:
 - (i) Demonstrate initial compliance for each capture system and each control device through performance tests;
 - (ii) Establish the operating limits for each capture system and control device during the performance testing; and,
 - (iii) Meet the operating limits at all times after establishing them.
- (2) For capture systems which are permanent total enclosures, the permittee shall:
 - (i) Demonstrate that a total enclosure is installed;
 - (ii) Monitor the capture system operating parameters at all times web coating is being performed.
- (3) For the solvent recovery systems, operate continuous emission monitoring systems and perform quarterly audits, 40 CFR 63.3350(d).
- (4) At all times, the permittee must maintain the monitoring systems in proper working order including, but not limited to, maintaining necessary parts for routine repairs of the monitoring equipment, 40 CFR 63.3350(e)(6).

Add the following per 40 CFR Section 63.3330(a)(2):
 (iv) Perform a periodic emissions performance test by July 9, 2023, or within 60 months of the previous test, whichever is later, and subsequent tests no later than 60 months thereafter, as required in § 63.3360.

Update to 63.3350(e)(7)

Compliance Demonstration Method:

The permittee shall keep records of control operations associated with Line 3R. Also, See testing requirements below.

2. Emission Limitations:

See Section B.2 for each individual line

3. Testing Requirements:

- a) The permittee shall perform destruction efficiency testing of the Thermal Oxidizers within five (5) years from the last test performed.
- b) See Section G, paragraph 5 of this permit for additional testing requirements.
- c) Thermal Oxidizers, 40 CFR 63.3360(e)(3)(i).
 - i. During the performance test, monitor and record the combustion temperature at least once every 15 minutes during each of the three test runs. Monitor the temperature in the firebox of the thermal oxidizer or immediately downstream of the firebox before any substantial heat exchange occurs.
 - ii. Use the data collected during the performance test to calculate and record the average combustion temperature maintained during the performance test. ~~This average combustion temperature is the minimum operating limit for the thermal oxidizer.~~

Replace with "each"

Replace redeclined language with the following:
 Maintain the 3-hour average combustion temperature no more than 50 degrees lower than this average combustion temperature.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

WEB COATING LINES – OVERVIEW

3. Testing Requirements (continued):

d) Capture Efficiency, 40 CFR 63.3360(f).

- i. You may assume your capture efficiency equals 100 percent if your capture system is a Permanent Total Enclosure (PTE). You must confirm that your capture system is a PTE by demonstrating that it meets the requirements of section 6 of EPA Method 204 of 40 CFR part 51, appendix M, and that all exhaust gases from the enclosure are delivered to a control device.
- ii. You may determine capture efficiency according to the protocols for testing with temporary total enclosures that are specified in Methods 204 and 204A through F of 40 CFR part 51, appendix M.

Add the following option from 40 CFR Section 63.3360(f)(3):
 iii. You may use any capture efficiency protocol and test methods that satisfy the criteria of either the Data Quality Objective or the Lower Confidence Limit approach as described in appendix A of subpart KK of this part. You may exclude never-controlled work stations from such capture efficiency determinations.

~~e) The permittee must record such process information as may be necessary to determine the conditions in existence at the time of the performance test. Operations during periods of startup, shutdown, and malfunction will not constitute representative conditions for the purpose of a performance test, 40 CFR 63.3360(e)(2).~~

4. Specific Monitoring Requirements:

See Section B.4 for each individual line

Replace the redlined language with the following:
 The permittee must record such process information as may be necessary to determine the conditions in existence at the time of the performance test. Representative conditions exclude periods of startup and shutdown. You may not conduct performance tests during periods of malfunction. You must record the process information that is necessary to document operating conditions during the test and include in such record an explanation to support that such conditions represent normal operation. Upon request, you shall make available to the Administrator such records as may be necessary to determine the conditions of performance tests, 40 CFR 63.3360(e)(2).

5. Specific Recordkeeping Requirements:

a) The permittee shall maintain files of all information (including all reports and notifications) required by this part recorded in a form suitable and readily available for expeditious inspection and review. The files shall be retained for at least 5 years following the date of each occurrence, measurement, maintenance, corrective action, report, or record, 40 CFR 63.10(b)(1).

b) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

- ~~i. The occurrence and duration of each startup or shutdown when the startup or shutdown causes the source to exceed any applicable emission limitation in the streamlined set of emissions limits listed at Section B.2 of this permit;~~
- ii. ~~The occurrence and duration of each malfunction of operation (i.e., process equipment) or the required air pollution control and monitoring equipment;~~
- iii. All required maintenance performed on the air pollution control and monitoring equipment;
- iv. ~~A. Actions taken during periods of startup or shutdown when the source exceeded applicable emission limitations in the streamlined set of emissions limits listed at Section B.2 and when the actions taken are different from the procedures specified in the affected source's startup, shutdown, and malfunction plan (see 40 CFR 63.6(e)(3)); or~~

Remove language. As of 7/9/2021, SSM provisions and associated requirements no longer apply under MACT JJJJ.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)WEB COATING LINES – OVERVIEW**5. Specific Recordkeeping Requirements (continued):**

- ~~B. Actions taken during periods of malfunction (including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation) when the actions taken are different from the procedures specified in the affected source's startup, shutdown, and malfunction plan (see 40 CFR 63.6(e)(3));~~
- v. ~~All information necessary, including actions taken, to demonstrate conformance with the affected source's startup, shutdown, and malfunction plan (see 40 CFR 63.6(e)(3)) when all actions taken during periods of startup or shutdown (and the startup or shutdown causes the source to exceed any applicable emission limitation in the relevant emission standards), and malfunction (including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation) are consistent with the procedures specified in such plan. (The information needed to demonstrate conformance with the startup, shutdown, and malfunction plan may be recorded using a "checklist," or some other effective form of recordkeeping, in order to minimize the recordkeeping burden for conforming events);~~
- vi. Each period during which a CMS is malfunctioning or inoperative (including out-of-control periods);

Remove language. As of 7/9/2021, SSM provisions and associated requirements no longer apply under MACT JJJJ.

6. Specific Reporting Requirements:

See Section B.6 for each individual line

7. Specific Control Equipment Operating Conditions:

See Section B.7 for each individual line

8. Alternate Operating Scenarios:

See Section B.8 for each individual line

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

1. Operating Limitations:

See OVERALL requirements

2. Emission Limitations:**a) Limitations on VOC mass emissions under 401 KAR 51:017**

1R Coating Line. VOC emissions from 1R Line, after control, if any, shall not exceed 47,946.4 pounds per month (lb/mo.), based on a monthly total.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b and 11b in Attachment B for details.

b) Limitations on VOC emission rate under 401 KAR 51:017

- i. 1R and 2R Coating Lines. Combined VOC emissions from the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 shall not exceed 278.1 lbs/hr, based on a monthly weighted average. Emissions resulting from cleanup operations are not included in this limitation.
- ii. 1R and 2R Coating Lines. Combined VOC emissions from usage of cleanup solvents by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 shall not exceed 1.14 lbs/hr, based on a monthly weighted average.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.

- c) Limitations on VOC emissions from usage of cleanup solvents under 401 KAR 51:017 1R and 2R Coating Lines.** Combined VOC emissions from usage of cleanup solvent by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 shall not exceed 4.99 tpy, based on a twelve (12) month rolling total of monthly VOC emissions.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

2. Emission Limitations (continued):**Compliance Demonstration Method:**

- i. Compliance with this emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.

d) Other emission limitations under 401 KAR 51:017

1R Coating Line. VOC emissions from the collection of uncontrolled applicators / work stations of 1R shall not exceed 0.14 kg/kg (0.14 lb/lb) coating solids applied, based on a monthly weighted average across all such uncontrolled applicators / work stations of 1R. Refer to Section B.8. Alternate Operating Scenarios:

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b, 10b and 11b in Attachment B for details.

e) Emission limitations under 40 CFR Part 63 Subpart JJJJ

These emissions standards apply to all of the noted applicators / work stations, whether considered individually, as a single collection, or as any combination thereof.

- i. ≤ 0.05 lb VOC per lb VOC applied; or
- ii. ≤ 0.04 lb VOC per lb coating materials applied; or
- iii. ≤ 0.20 lb VOC per lb coating solids applied

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

2. Emission Limitations (continued):

iii. The Permittee may reference Equations 1b, 8b, 9b, 10b and 11b in Attachment B for details.

f) Emission limitations issued pursuant to 401 KAR 59:210

The permittee shall not discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility based on an averaging period not to exceed twenty-four (24) hours. If any portion of the series of equipment or operations qualifies for an exemption according to Section 6 of 401 KAR 59:210, then that portion shall be considered to be a separate coating line.

- i. 401 KAR 59:210, Section 3, No person shall cause, allow, or permit an affected facility to discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility; or
- ii. 401 KAR 59:210, Section 6 (1), Any affected facility coating fabric or paper shall be exempt from Section 3 of this administrative regulation if the VOC content of coatings < 2.9 lb/gal, excluding water or exempt solvent or both, delivered to the applicators associated with the coating line, daily average basis.

Compliance Demonstration Method:

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
- ii. Each record shall state whether compliance is demonstrated with the limit or through the exemption.
- iii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iv. The Permittee may reference Equations 1c, 2c, 5c and/or 8c in Attachment B for details.

3. Testing Requirements:

See OVERALL requirements

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

4. Specific Monitoring Requirements:

Solvent recovery device

- a) Continuously monitor the gas stream entering and exiting the control device to determine the volatile matter concentration of the vent gas at the inlet and outlet of the solvent recovery unit such that the control device efficiency can be calculated for each month using Equation 2 of 40 CFR 63.3360 (refer to the referenced section for details). The permittee will use this calculated control efficiency with the equations of Section D of this permit to calculate emissions from the workstations controlled by the SRU.
- b) Capture and control efficiency monitoring.
 - i. Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.
- c) Determine the percent capture efficiency in accordance with 40 CFR 63.3360(f).

5. Specific Recordkeeping Requirements:

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

- a) All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);
 - i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:
 1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as "never-controlled" workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;
 5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

5. Specific Recordkeeping Requirements (continued):

6. The date for each application of coating, adhesive, graphic arts material, or solvent;
 7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.
- B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).
- This record may take the form of a "library" of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.
- C. Continuous emission monitor data for the solvent recovery device in accordance with the requirements of 40 CFR 63.3350(d);
1. Measure the organic volatile concentration at both the control device inlet and the outlet such that the reduction efficiency can be determined. Each continuous emission monitor must comply with performance specification 8 or 9 of 40 CFR part 60, appendix B, as appropriate, 40 CFR 63.3350 (d)(1)(i).
 2. The permittee will follow the quality assurance procedures in procedure 1, appendix F of 40 CFR part 60. In conducting the quarterly audits of the monitors as required by procedure 1, appendix F, the permittee must use compounds representative of the gaseous emission stream being controlled, 40 CFR 63.3350 (d)(1)(ii).
 3. The permittee shall have valid data from at least 90 percent of the hours during which the process is operated, 40 CFR 63.3350 (d)(1)(iii).
- D. Maintain a calendar month record of the amount of solvent applied in the coating at each affected facility controlled by a solvent recovery device, 40 CFR 60.445(b);
- E. Control device and capture system operating parameter data in accordance with the requirements of 40 CFR 63.3350(c), (e), and (f);
- F. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
- G. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

5. Specific Recordkeeping Requirements (continued):

- H. Overall control efficiency determination using capture efficiency and control device destruction or removal efficiency test results in accordance with the requirements of 40 CFR 63.3360(e) and (f); and
 - I. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
 - J. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthiana February 2-18, 2009.
 - K. Monthly VOC emissions from the 1R coating line.
 - L. Combined hourly average VOC emissions from the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.
 - M. Combined hourly average VOC emissions from usage of cleanup solvents by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.
 - N. The twelve (12) month rolling total VOC emissions from usage of cleanup solvent by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.
 - O. Monthly VOC emissions based on the mass of coating solids applied for the 1R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
 - P. Monthly average overall VOC control efficiency for the 1R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
 - Q. Maintain a record (beginning and end dates and times) when the permittee switches from one operating scenario to another as required by Section B.8. Alternate Operating Scenarios.
 - R. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.
- b) All results of performance tests, CMS performance evaluations, and opacity and visible emission observations;
 - c) All measurements as may be necessary to determine the conditions of performance tests and performance evaluations;
 - d) All CMS calibration checks;
 - i. For each CEM a record of all quarterly audits, 40 CFR 63.3350(d)(1)(ii).
 - ii. Record the results of each inspection, calibration, and validation check of each CPMS, 40 CFR ~~63.3350(e)(5)~~.
 - e) All adjustments and maintenance performed on the CMS;

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

6. Specific Reporting Requirements:

- a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.
- i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
 - ii. The compliance report must contain the information in paragraphs (2)(A) through (F) of this section:
 - A. Company name and address.
 - B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.
 - C. Date of report and beginning and ending dates of the reporting period.
 - D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period, and that no CEMS was inoperative, inactive, malfunctioning, out-of-control, repaired, or adjusted.
 - E. For each deviation from an emission limitation (emission limit or operating limit) that applies to you and that occurs at an affected source where you are not using a CEMS to comply with the emission limitations in this subpart, the compliance report must contain the information in paragraphs (2)(i) through (iii) of this section, and:
 1. The total operating time of each affected source during the reporting period.
 2. Information on the number, duration, and cause of deviations (including unknown cause), if applicable, and the corrective action taken.
 3. Information on the number, duration, and cause for CPMS downtime incidents, if applicable, other than downtime associated with zero and span and other calibration checks.
 - F. For each deviation from an emission limit occurring at an affected source where you are using a CEMS to comply with the emission limit in this subpart, you must include the information in paragraphs (2)(i) through (iii) above and paragraphs 1 through 10 as given below.
 1. ~~The date and time that each malfunction started and stopped.~~
 2. The date and time that each CEMS and CPMS, if applicable, was inoperative except for zero (low-level) and high-level checks.
 3. The date and time that each CEMS and CPMS, if applicable, was out-of-control, including the information in 40 CFR 63.8(c)(8).
 4. The date and time that each deviation started and stopped, and whether each deviation occurred during a period of startup, shutdown, or malfunction or during another period.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

6. Specific Reporting Requirements (continued):

5. A summary of the total duration (in hours) of each deviation during the reporting period and the total duration of each deviation as a percent of the total source operating time during that reporting period.
 6. A breakdown of the total duration of the deviations during the reporting period into those that are due to startup, shutdown, control equipment problems, process problems, other known causes, and other unknown causes.
 7. A summary of the total duration (in hours) of CEMS and CPMS downtime during the reporting period and the total duration of CEMS and CPMS downtime as a percent of the total source operating time during that reporting period.
 8. A breakdown of the total duration of CEMS and CPMS downtime during the reporting period into periods that are due to monitoring equipment malfunctions, nonmonitoring equipment malfunctions, quality assurance/quality control calibrations, other known causes, and other unknown causes.
 9. The date of the latest CEMS and CPMS certification or audit.
 10. A description of any changes in CEMS, CPMS, or controls since the last reporting period.
- b) ~~The permittee must submit startup, shutdown, and malfunction reports as specified in 40 CFR 63.10(d)(5), except that the provisions in subpart A of part 63 pertaining to startups, shutdowns, and malfunctions do not apply unless a control device is used to comply with this subpart:~~
- ~~i. If actions taken by an owner or operator during a startup, shutdown, or malfunction of an affected source (including actions taken to correct a malfunction) are not consistent with the procedures specified in the affected source's SSMP required by 40 CFR 63.6(e)(3), the owner or operator must state such information in the report. The startup, shutdown, or malfunction report must consist of a letter containing the name, title, and signature of the responsible official who is certifying its accuracy and must be submitted to the Administrator.~~
 - ~~ii. Separate startup, shutdown, and malfunction reports are not required if the information is included in the report specified in paragraph a.(2)(vi) of this section.~~
- c) Additional semiannual reporting requirements.
- i. Monthly VOC emissions from the 1R coating line.
 - ii. Combined hourly average VOC emissions from the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.
 - iii. Combined hourly average VOC emissions from usage of cleanup solvents by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

6. Specific Reporting Requirements (continued):

- iv. The twelve (12) month rolling total VOC emissions from usage of cleanup solvent by the collection of applicators / work stations 1R1, 1R2, 1R3, 2R1, 2R2, and 2R3 as calculated each month.
- v. Monthly VOC emissions based on the mass of coating solids applied for the 1R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
- vi. Monthly average overall VOC control efficiency for the 1R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
- vii. The permittee shall identify the operating scenario used during the reporting period.
- viii. The permittee shall identify the compliance option used during the reporting period for each coating line.
- ix. Compliance report as required in 40 CFR Part 63, Subpart HHHHH. The report shall contain the information specified in 40 CFR 63.8075(e)(1) through (8)

7. Specific Control Equipment Operating Conditions:

- a) Thermal Oxidizer.
~~The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i):~~
 - i. Collect the combustion temperature data according to 40 CFR 63.3350(e)(9);
 - ~~ii. Maintain the 3-hour rolling average combustion temperature at or above the temperature limit.~~
- b) Capture Systems.
Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.
 - i. Submit a capture system monitoring plan to the Division that identifies operating parameters to be monitored according to 40 CFR 63.3350(f).
 - ii. Conduct monitoring according to the plan, 40 CFR 63.3350(f)(3).
- c) Continuous parameter monitoring systems (CPMS), 40 CFR 63.3350(e)
 - i. 3M Cynthia records CPMS data every 4-minutes for a total of 15 data readings per hour. New 3-hour rolling averages will then be calculated every 4-minutes.
 - ii. You must have valid data from at least 90 percent of the hours during which the process operated.
 - iii. Twelve readings per hour must be from a monitoring system that is not out of control to be considered a valid hour of data, and;
 - iv. Two hours of any consecutive 3-hour period must be valid to have a valid 3-hour average.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)1R LINE

1R Line requirements to be removed.
Line is decommissioned.

7. Specific Control Equipment Operating Conditions (continued):

- v. Provided the conditions (1), (3), and (4) above are met, 3M will not be required to calculate hourly block averages or the 3-hour ~~rolling~~ average based on the hourly block averages required by 40 CFR 63.3350(e)(3) and (4).
- d) **See Section E** for additional requirements including monitoring equipment installation, initial calibration, ongoing verification, and development of the Capture system monitoring plan.

8. Alternate Operating Scenarios:

The permittee may operate the 1R line without any control devices, in which case the 1R line is subject to the emission limitation issued pursuant to 401 KAR 51:017 of 0.14 kg VOC / kg of coatings solids. Alternatively, the permittee may operate the 1R line utilizing capture and control, in which case the 1R line is subject to the emission limitations of 40 CFR 63, Subpart JJJJ. The 1R line must be in compliance with either standard at all times, but it is not necessary to show compliance with both standards at the same time. When making a change from one operating scenario to another, the permittee shall record contemporaneously in a log at the permitted facility a record of the scenario under which the facility is operating.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**1. Operating Limitations:**

See OVERALL requirements

2. Emission Limitations:**a) Limitations on VOC mass emissions under 401 KAR 51:017**

2R Coating Line. VOC emissions from 2R, after control, if any, shall not exceed 37,485.5 pounds per month (lb/mo.), based on a monthly total.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b and 11b in Attachment B for details.

Remove 1R language. The line has been decommissioned.

b) Limitations on VOC emission rate under 401 KAR 51:017

- i. ~~1R and 2R Coating Lines.~~ Combined VOC emissions from the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ shall not exceed 278.1 lbs/hr, based on a monthly weighted average. Emissions resulting from cleanup operations are not included in this limitation.
- ii. ~~1R and 2R Coating Lines.~~ Combined VOC emissions from usage of cleanup solvents by the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ shall not exceed 1.14 lbs/hr, based on a monthly weighted average.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE

Remove 1R items. The line has been decommissioned.

2. Emission Limitations (continued):

- c) **Limitations on VOC emissions from usage of cleanup solvents under 401 KAR 51:017 ~~1R and 2R Coating Lines.~~** Combined VOC emissions from usage of cleanup solvent by the collection of applicators / work stations ~~1R1, 1R2, 1R3,~~ 2R1, 2R2, and 2R3 shall not exceed 4.99 tpy, based on a twelve (12) month rolling total of monthly VOC emissions.

Compliance Demonstration Method:

- i. Compliance with this emissions limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- d) **Other emission limitations under 401 KAR 51:017**
VOC emissions from the collection of uncontrolled applicators / work stations of 2R shall not exceed 0.14 kg/kg (0.14 lb/lb) coating solids applied, based on a monthly weighted average across all such uncontrolled applicators / work stations of 2R. Refer to Section B.8. Alternate Operating Scenarios:

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
 - iii. The Permittee may reference Equations 1b, 8b, 10b and 11b in Attachment B for details.
- e) **Emission limitations under 40 CFR Part 63 Subpart JJJJ**
These emissions standards apply to all of the noted applicators / work stations, whether considered individually, as a single collection, or as any combination thereof.
- i. ≤ 0.05 lb VOC per lb VOC applied; or
 - ii. ≤ 0.04 lb VOC per lb coating materials applied; or
 - iii. ≤ 0.20 lb VOC per lb coating solids applied

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**2. Emission Limitations (continued):****Compliance Demonstration Method:**

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b, 9b, 10b and 11b in Attachment B for details.

f) Emission limitations issued pursuant to 401 KAR 59:210

The permittee shall not discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility based on an averaging period not to exceed twenty-four (24) hours. If any portion of the series of equipment or operations qualifies for an exemption according to Section 6 of 401 KAR 59:210, then that portion shall be considered to be a separate coating line.

- i. 401 KAR 59:210, Section 3, No person shall cause, allow, or permit an affected facility to discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility; or
- ii. 401 KAR 59:210, Section 6 (1), Any affected facility coating fabric or paper shall be exempt from Section 3 of this administrative regulation if the VOC content of coatings < 2.9 lb/gal, excluding water or exempt solvent or both, delivered to the applicators associated with the coating line, daily average basis.

Compliance Demonstration Method:

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
- ii. Each record shall state whether compliance is demonstrated with the limit or through the exemption.
- iii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iv. The Permittee may reference Equations 1c, 2c, 5c and/or 8c in Attachment B for details.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**3. Testing Requirements:**

See OVERALL requirements

4. Specific Monitoring Requirements:

See OVERALL requirements

5. Specific Recordkeeping Requirements:

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

- a) All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);
 - i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:
 1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as “never-controlled” workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;
 5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;
 6. The date for each application of coating, adhesive, graphic arts material, or solvent;
 7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**5. Specific Recordkeeping Requirements (continued):**

- B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).
- This record may take the form of a "library" of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.
- C. Control device and capture system operating parameter data in accordance with the requirements of 40 CFR 63.3350(c), (e), and (f);
- D. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
- E. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);
- F. Overall control efficiency determination using capture efficiency and control device destruction or removal efficiency test results in accordance with the requirements of 40 CFR 63.3360(e) and (f); and
- G. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
- H. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthiana February 2-18, 2009.
- I. Monthly VOC emissions from the 2R coating line.
- J. Combined hourly average VOC emissions from the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.
- K. Combined hourly average VOC emissions from usage of cleanup solvents by the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.
- L. The twelve (12) month rolling total VOC emissions from usage of cleanup solvent by the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.

Remove 1R related items. The line has been decommissioned.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**5. Specific Recordkeeping Requirements (continued):**

- M. Monthly VOC emissions based on the mass of coating solids applied for the 2R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
 - N. Monthly average overall VOC control efficiency for the 2R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
 - O. Maintain a record (beginning and end dates and times) when the permittee switches from one operating scenario to another as required by Section B.8. Alternate Operating Scenarios.
 - P. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.
- b) All results of performance tests, CMS performance evaluations, and opacity and visible emission observations;
 - c) All measurements as may be necessary to determine the conditions of performance tests and performance evaluations;
 - d) All CMS calibration checks;
 - i. Record the results of each inspection, calibration, and validation check of each CPMS, 40 CFR ~~63.3350(e)(5)~~.
 - e) All adjustments and maintenance performed on the CMS;

This requirement is now 63.3350(e)(6)

6. Specific Reporting Requirements:

- a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.
 - i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
 - ii. The compliance report must contain the information in paragraphs (2)(A) through (E) of this section:
 - A. Company name and address.
 - B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.
 - C. Date of report and beginning and ending dates of the reporting period.
 - D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period, and that no CMS was inoperative, inactive, malfunctioning, out-of-control, repaired, or adjusted.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)2R LINE**6. Specific Reporting Requirements (continued):**

b) ~~The permittee must submit startup, shutdown, and malfunction reports as specified in 40 CFR 63.10(d)(5), except that the provisions in subpart A of part 63 pertaining to startups, shutdowns, and malfunctions do not apply unless a control device is used to comply with this subpart.~~

Remove language. As of 7/9/2021, 63.10(d)(5) no longer applies under MACT JJJJ.

- i. ~~If actions taken by an owner or operator during a startup, shutdown, or malfunction of an affected source (including actions taken to correct a malfunction) are not consistent with the procedures specified in the affected source's SSMP required by 40 CFR 63.6(e)(3), the owner or operator must state such information in the report. The startup, shutdown, or malfunction report must consist of a letter containing the name, title, and signature of the responsible official who is certifying its accuracy and must be submitted to the Administrator.~~
- ii. ~~Separate startup, shutdown, and malfunction reports are not required if the information is included in the report specified in paragraph a.(2)(vi) of this section.~~

c) Additional semiannual reporting requirements.

- i. Monthly VOC emissions from the 2R coating line.
- ii. Combined hourly average VOC emissions from the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.
- iii. Combined hourly average VOC emissions from usage of cleanup solvents by the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.
- iv. The twelve (12) month rolling total VOC emissions from usage of cleanup solvent by the collection of applicators / work stations ~~1R1, 1R2, 1R3, 2R1, 2R2, and 2R3~~ as calculated each month.
- v. Monthly VOC emissions based on the mass of coating solids applied for the 2R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
- vi. Monthly average overall VOC control efficiency for the 2R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
- vii. The permittee shall identify the operating scenario used during the reporting period.
- viii. The permittee shall identify the compliance option used during the reporting period for each coating line.
- ix. ~~Compliance report as required in 40 CFR Part 63, Subpart HHHHHH. The report shall contain the information specified in 40 CFR 63.8075(e)(1) through (8)~~

Remove 1R related items. The line has been decommissioned.

Request MACT 5H language be removed since MACT 5H does not apply to coating lines and MACT 5H requirements associated with regulated units are included elsewhere in the permit (see Solvent Compounding).

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

2R LINE

7. Specific Control Equipment Operating Conditions:

a) Thermal Oxidizer.

~~The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i).~~

- i. Collect the combustion temperature data according to 40 CFR 63.3350(e)(9);
- ii. ~~Maintain the 3-hour rolling average combustion temperature at or above the temperature limit.~~

b) Capture Systems.

Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.

- i. Submit a capture system monitoring plan to the Division that identifies operating parameters to be monitored according to 40 CFR 63.3350(f).
- ii. Conduct monitoring according to the plan, 40 CFR 63.3350(f)(3).

c) Continuous parameter monitoring systems (CPMS), 40 CFR 63.3350(e).

- i. 3M Cynthiana records CPMS data every 4-minutes for a total of 15 data readings per hour. New 3-hour rolling averages will then be calculated every 4-minutes.
- ii. You must have valid data from at least 90 percent of the hours during which the process operated.
- iii. Twelve readings per hour must be from a monitoring system that is not out of control to be considered a valid hour of data, and;
- iv. Two hours of any consecutive 3-hour period must be valid to have a valid 3-hour average.
- v. Provided the conditions (1), (3), and (4) above are met, 3M will not be required to calculate hourly block averages or the 3-hour ~~rolling~~ average based on the hourly block averages required by 40 CFR 63.3350(e)(3) and (4).

d) **See Section E** for additional requirements including monitoring equipment installation, initial calibration, ongoing verification, and development of the Capture system monitoring plan.

8. Alternate Operating Scenarios:

The permittee may operate the 2R line without any control devices, in which case the 2R line is subject to the emission limitation issued pursuant to 401 KAR 51:017 of 0.14 kg VOC / kg of coatings solids. Alternatively, the permittee may operate the 2R line utilizing capture and control, in which case the 2R line is subject to the emission limitations of 40 CFR 63, Subpart JJJJ. The 2R line must be in compliance with either standard at all times, but it is not necessary to show compliance with both standards at the same time. When making a change from one operating scenario to another, the permittee shall record contemporaneously in a log at the permitted facility a record of the scenario under which the facility is operating.

Replace the redline language with the following:

The average combustion temperature in any 3-hour period must not fall more than 50 degrees Fahrenheit below the combustion temperature limit established according to 40 CFR 63.330(e)(3)(i).

Add the following language under 7.a Thermal Oxidizer:

ii. Maintain the 3-hour average combustion temperature no more than 50 degrees Fahrenheit lower than this average combustion temperature, 63.3360(e)(3)(i)(B)

Delete "rolling"

SECTION B – EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**1. Operating Limitations:**

See OVERALL requirements

2. Emission Limitations:

- a) **Limitations on VOC mass emissions under 401 KAR 51:017.** VOC emissions from 3R, after control, if any, shall not exceed 51.5 tons per year (tpy), based on a twelve (12) month rolling total of monthly VOC emissions.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
 - iii. The Permittee may reference Equations 1b, 8b and 11b in Attachment B for details.
- b) **Other emission limitations under 401 KAR 51:017.** VOC emissions from 3R, after control, if any, shall not exceed 0.019 lb/lb coating solids applied, based on a monthly weighted average across all applicators / work stations of 3R.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b, 10b and 11b in Attachment B for details.

SECTION B – EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**2. Emission Limitations (continued):**

- c) **Emission limitations under 40 CFR Part 63 Subpart JJJJ**, Subsumed by BACT limit of 0.019 lb VOC/ lb of coating solids applied.
- d) **Emission limitations issued pursuant to 401 KAR 59:210**
The permittee shall not discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility based on an averaging period not to exceed twenty-four (24) hours. If any portion of the series of equipment or operations qualifies for an exemption according to Section 6 of 401 KAR 59:210, then that portion shall be considered to be a separate coating line.
- i. 401 KAR 59:210, Section 3, No person shall cause, allow, or permit an affected facility to discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility; or
 - ii. 401 KAR 59:210, Section 6 (1), Any affected facility coating fabric or paper shall be exempt from Section 3 of this administrative regulation if the VOC content of coatings < 2.9 lb/gal, excluding water or exempt solvent or both, delivered to the applicators associated with the coating line, daily average basis.

Compliance Demonstration Method:

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
- ii. Each record shall state whether compliance is demonstrated with the limit or through the exemption.
- iii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iv. The Permittee may reference Equations 1c, 2c, 5c and/or 8c in Attachment B for details.

3. Testing Requirements:

See OVERALL requirements

4. Specific Monitoring Requirements:

None

SECTION B – EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**5. Specific Recordkeeping Requirements:**

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

- a) All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);
 - i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:
 1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as “never-controlled” workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;
 5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;
 6. The date for each application of coating, adhesive, graphic arts material, or solvent;
 7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.
 - B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
 1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**5. Specific Recordkeeping Requirements (continued):**

This record may take the form of a “library” of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.

- C. Control device and capture system operating parameter data in accordance with the requirements of 40 CFR 63.3350(c), (e), and (f);
 - D. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
 - E. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);
 - F. Overall control efficiency determination using capture efficiency and control device destruction or removal efficiency test results in accordance with the requirements of 40 CFR 63.3360(e) and (f); and
 - G. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
 - H. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthiana February 2-18, 2009.
 - I. Monthly VOC emissions from the 3R coating line.
 - J. The twelve (12) month rolling total VOC emissions as calculated each month for the 3R coating line.
 - K. Monthly VOC emissions based on the mass of coating solids applied for the 3R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
 - L. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.
- b) All results of performance tests, CMS performance evaluations, and opacity and visible emission observations;
 - c) All measurements as may be necessary to determine the conditions of performance tests and performance evaluations;
 - d) All CMS calibration checks;
 - i. Record the results of each inspection, calibration, and validation check of each CPMS, 40 CFR ~~63.3350(e)(5)~~.
 - e) All adjustments and maintenance performed on the CMS;

This requirement is now 63.3350(e)(6)

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**6. Specific Reporting Requirements:**

a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.

- i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
- ii. The compliance report must contain the information in paragraphs (2)(A) through (E) of this section:
 - A. Company name and address.
 - B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.
 - C. Date of report and beginning and ending dates of the reporting period.
 - D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period, and that no CMS was inoperative, inactive, malfunctioning, out-of-control, repaired, or adjusted.
 - E. For each deviation from an emission limitation (emission limit or operating limit) that applies to you and that occurs at an affected source where you are not using a CMS to comply with the emission limitations in this subpart, the compliance report must contain the information in paragraphs (2)(i) through (iii) of this section, and:
 1. The total operating time of each affected source during the reporting period.
 2. Information on the number, duration, and cause of deviations (including unknown cause), if applicable, and the corrective action taken.
 3. Information on the number, duration, and cause for CPMS downtime incidents, if applicable, other than downtime associated with zero and span and other calibration checks.

Replace with the following per 63.3340(c)(2)(v):

CMS

~~b) The permittee must submit startup, shutdown, and malfunction reports as specified in 40 CFR 63.10(d)(5), except that the provisions in subpart A of part 63 pertaining to startups, shutdowns, and malfunctions do not apply unless a control device is used to comply with this subpart.~~

- ~~i. If actions taken by an owner or operator during a startup, shutdown, or malfunction of an affected source (including actions taken to correct a malfunction) are not consistent with the procedures specified in the affected source's SSMP required by 40 CFR 63.6(e)(3), the owner or operator must state such information in the report. The startup, shutdown, or malfunction report must consist of a letter containing the name, title, and signature of the responsible official who is certifying its accuracy and must be submitted to the Administrator.~~

Remove language. As of 7/9/2021, 63.10(d)(5) no longer applies under MACT JJJJ.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

3R LINE

6. Specific Reporting Requirements (continued):

- ii. ~~Separate startup, shutdown, and malfunction reports are not required if the information is included in the report specified in paragraph a.(2)(vi) of this section.~~

c) Additional semiannual reporting requirements.

- i. Monthly VOC emissions from the 3R coating line.
- ii. The twelve (12) month rolling total VOC emissions as calculated each month for the 3R coating line.
- iii. Monthly VOC emissions based on the mass of coating solids applied for the 3R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
- iv. The permittee shall identify the operating scenario used during the reporting period.
- v. The permittee shall identify the compliance option used during the reporting period for each coating line.
- vi. ~~Compliance report as required in 40 CFR Part 63, Subpart HHHHH. The report shall contain the information specified in 40 CFR 63.8075(e)(1) through (8)~~

Request MACT 5H language be removed since MACT 5H does not apply to coating lines and MACT 5H requirements associated with regulated units are included elsewhere in the permit (see Solvent Compounding).

Replace redline language with the following:

The average combustion temperature in any 3-hour period must not fall more than 50 degrees Fahrenheit below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i).

7. Specific Control Equipment Operating Conditions:

a) Thermal Oxidizer.

- ~~The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i).~~
- i. Collect the combustion temperature data according to 40 CFR 63.3350(e)(9);
 - ii. ~~Maintain the 3-hour rolling average combustion temperature at or above the temperature limit.~~

b) Capture Systems.

- Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.
- i. Submit a capture system monitoring plan to the Division that identifies operating parameters to be monitored according to 40 CFR 63.3350(f).
 - ii. Conduct monitoring according to the plan, 40 CFR 63.3350(f)(3).

Add the following language under 7.a Thermal Oxidizer:

ii. Maintain the 3-hour average combustion temperature no more than 50 degrees Fahrenheit lower than this average combustion temperature, 63.3360(e)(i)(B)

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)3R LINE**7. Specific Control Equipment Operating Conditions (continued):**

- c) Continuous parameter monitoring systems (CPMS), 40 CFR 63.3350(e).
- i. 3M Cynthiana records CPMS data every 4-minutes for a total of 15 data readings per hour. New 3-hour rolling averages will then be calculated every 4-minutes.
 - ii. You must have valid data from at least 90 percent of the hours during which the process operated.
 - iii. Twelve readings per hour must be from a monitoring system that is not out of control to be considered a valid hour of data, and;
 - iv. Two hours of any consecutive 3-hour period must be valid to have a valid 3-hour average.
 - v. Provided the conditions (1), (3), and (4) above are ~~met~~, 3M will not be required to calculate hourly block averages or the 3-hour ~~rolling~~ average based on the hourly block averages required by 40 CFR 63.3350(e)(3) and (4).
- d) **See Section E** for additional requirements including monitoring equipment installation, initial calibration, ongoing verification, and development of the Capture system monitoring plan.

Delete "rolling"

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

4R LINE

1. Operating Limitations:

See OVERALL requirements

Request language be updated to to remove chemical specific references.

Methyl Ethyl Ketone (MEK) should be removed and 620 should be updated to 980. IPA specific requirement should be removed.

The proposed edits would result in a cleanup solvent limit of 980 gal/yr, based on a 12-month rolling total.

2. Emission Limitations:

a) **Limitations on material usage under 401 KAR 51:017**

- i. ~~**4R Coating Line.** Usage of Methyl Ethyl Ketone (MEK) as a cleanup solvent for the 4R coating line shall not exceed 620 gal/yr, based on a twelve (12) month rolling total of monthly usage totals.~~
- ii. ~~**4R Coating Line.** Usage of Isopropyl Alcohol (IPA) as a cleanup solvent for the 4R coating line shall not exceed 360 gal/yr, based on a twelve (12) month rolling total of monthly usage totals.~~

Compliance Demonstration Method:

- i. Compliance with each limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Sum the volume of MEK used each month, with the volume of MEK used for each of the preceding eleven (11) months to determine a new twelve (12) month rolling total.
 - iii. Sum the volume of IPA used each month, with the volume of IPA used for each of the preceding eleven (11) months to determine a new twelve (12) month rolling total.
 - iv. Compare the twelve (12) month rolling total usage of MEK and IPA to the limitations above.
- b) **Other emission limitations under 401 KAR 51:017.** VOC emissions from 4R, shall meet either of limitations below.
- i. $\geq 98\%$ overall VOC control, based on a monthly weighted average across all applicators / work stations of 4R; or
 - ii. ≤ 0.08 kg/kg (0.08 lb/lb) coating solids applied, based on a monthly weighted average across all applicators / work stations of 4R.
- Refer to Section B.8. Alternate Operating Scenarios:

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b, 10b and 11b in Attachment B for details.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)4R LINE**2. Emission Limitations (continued):**

- c) **Emission limitations under 40 CFR Part 63 Subpart JJJJ**, Subsumed by BACT control limit of 98% control, or the 0.08 lb VOC per lb of coating solids applied emission limit, monthly average.
- d) **Emission limitations issued pursuant to 401 KAR 59:210**
The permittee shall not discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility based on an averaging period not to exceed twenty-four (24) hours. If any portion of the series of equipment or operations qualifies for an exemption according to Section 6 of 401 KAR 59:210, then that portion shall be considered to be a separate coating line.
- i. 401 KAR 59:210, Section 3, No person shall cause, allow, or permit an affected facility to discharge into the atmosphere more than fifteen (15) percent by weight of the VOCs net input into the affected facility; or
 - ii. 401 KAR 59:210, Section 6 (1), Any affected facility coating fabric or paper shall be exempt from Section 3 of this administrative regulation if the VOC content of coatings < 2.9 lb/gal, excluding water or exempt solvent or both, delivered to the applicators associated with the coating line, daily average basis.

Compliance Demonstration Method:

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
- ii. Each record shall state whether compliance is demonstrated with the limit or through the exemption.
- iii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iv. The Permittee may reference Equations 1c, 2c, 5c and/or 8c in Attachment B for details.

3. Testing Requirements:

See OVERALL requirements

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)4R LINE**4. Specific Monitoring Requirements:**

Solvent recovery device

- a) Continuously monitor the gas stream entering and exiting the control device to determine the volatile matter concentration of the vent gas at the inlet and outlet of the solvent recovery unit such that the control device efficiency can be calculated for each month using Equation 2 of 40 CFR 63.3360 (refer to the referenced section for details). The permittee will use this calculated control efficiency with the equations of Section D of this permit to calculate emissions from the workstations controlled by the SRU.
- b) Capture and control efficiency monitoring.
 - i. Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.
- c) Determine the percent capture efficiency in accordance with 40 CFR 63.3360(f).

5. Specific Recordkeeping Requirements:

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

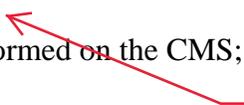
- a) All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);
 - i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:
 1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as “never-controlled” workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;
 5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;
 6. The date for each application of coating, adhesive, graphic arts material, or solvent;

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)4R LINE**5. Specific Recordkeeping Requirements (continued):**

7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.
- B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).
This record may take the form of a "library" of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.
- C. Continuous emission monitor data for the solvent recovery device in accordance with the requirements of 40 CFR 63.3350(d);
1. Measure the organic volatile concentration at both the control device inlet and the outlet such that the reduction efficiency can be determined. Each continuous emission monitor must comply with performance specification 8 or 9 of 40 CFR part 60, appendix B, as appropriate, 40 CFR 63.3350 (d)(1)(i).
 2. The permittee will follow the quality assurance procedures in procedure 1, appendix F of 40 CFR part 60. In conducting the quarterly audits of the monitors as required by procedure 1, appendix F, the permittee must use compounds representative of the gaseous emission stream being controlled, 40 CFR 63.3350 (d)(1)(ii).
 3. The permittee shall have valid data from at least 90 percent of the hours during which the process is operated, 40 CFR 63.3350 (d)(1)(iii).
- D. Maintain a calendar month record of the amount of solvent applied in the coating at each affected facility controlled by a solvent recovery device, 40 CFR 60.445(b);
- E. Control device and capture system operating parameter data in accordance with the requirements of 40 CFR 63.3350(c), (e), and (f);
- F. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
- G. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)4R LINE**5. Specific Recordkeeping Requirements (continued):**

- H. Overall control efficiency determination using capture efficiency and control device destruction or removal efficiency test results in accordance with the requirements of 40 CFR 63.3360(e) and (f); and
 - I. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
 - J. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthia February 2-18, 2009.
 - K. Monthly VOC emissions from the 4R coating line.
 - L. The twelve (12) month rolling total gallon usage of Methyl Ethyl Ketone (MEK) as a cleanup solvent for the 4R coating line as calculated each month.
 - M. The twelve (12) month rolling total gallon usage of Isopropyl Alcohol (IPA) as a cleanup solvent for the 4R coating line as calculated each month.
 - N. Monthly VOC emissions based on the mass of coating solids applied for the 4R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
 - O. Monthly average overall VOC control efficiency for the 4R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
 - P. Maintain a record (beginning and end dates and times) when the permittee switches from one operating scenario to another as required by Section B.8. Alternate Operating Scenarios.
 - Q. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.
- b) All results of performance tests, CMS performance evaluations, and opacity and visible emission observations;
 - c) All measurements as may be necessary to determine the conditions of performance tests and performance evaluations;
 - d) All CMS calibration checks;
 - i. For each CEM a record of all quarterly audits, 40 CFR 63.3350(d)(1)(ii).
 - ii. Record the results of each inspection, calibration, and validation check of each CPMS, 40 CFR 63.3350(e)(5).
 - e) All adjustments and maintenance performed on the CMS;



This requirement is now 63.3350(e)(6)

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

4R LINE

6. Specific Reporting Requirements:

a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.

- i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
- ii. The compliance report must contain the information in paragraphs (2)(A) through (F) of this section:

A. Company name and address.

B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.

C. Date of report and beginning and ending dates of the reporting period.

D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period, and that no CMS was inoperative, inactive, malfunctioning, out-of-control, repaired, or adjusted.

E. For each deviation from an emission limitation (emission limit or operating limit) that applies to you and that occurs at an affected source where you are not using a ~~CMS~~ to comply with the emission limitations in this subpart, the compliance report must contain the information in paragraphs (2)(i) through (iii) of this section, and:

1. The total operating time of each affected source during the reporting period.
2. Information on the number, duration, and cause of deviations (including unknown cause), if applicable, and the corrective action taken.
3. Information on the number, duration, and cause for CPMS downtime incidents, if applicable, other than downtime associated with zero and span and other calibration checks.

F. For each deviation from an emission limit occurring at an affected source where you are using a ~~CMS~~ to comply with the emission limit in this subpart, you must include the information in paragraphs (2)(i) through (iii) above and paragraphs 1 through 10 as given below.

- ~~1. The date and time that each malfunction started and stopped.~~
2. The date and time that each CEMS and CPMS, if applicable, was inoperative except for zero (low-level) and high-level checks.
3. The date and time that each CEMS and CPMS, if applicable, was out-of-control, including the information in 40 CFR 63.8(c)(8).
4. The date and time that each deviation started and stopped, and whether each deviation occurred during a period of startup, shutdown, or malfunction or during another period.

Replace with the following per 63.3340(c)(2)(v):

CMS

Replace with the following per 63.3340(c)(2)(vi):

CEMS or CPMS

Replace redlined language with the following per 63.3400(c)(2)(vi)(A):

1. The total operating time of the affected source during the reporting period

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

4R LINE

6. Specific Reporting Requirements (continued):

5. A summary of the total duration (in hours) of each deviation during the reporting period and the total duration of each deviation as a percent of the total source operating time during that reporting period.
6. A breakdown of the total duration of the deviations during the reporting period into those that are due to startup, shutdown, control equipment problems, process problems, other known causes, and other unknown causes.
7. A summary of the total duration (in hours) of CEMS and CPMS downtime during the reporting period and the total duration of CEMS and CPMS downtime as a percent of the total source operating time during that reporting period.
8. A breakdown of the total duration of CEMS and CPMS downtime during the reporting period into periods that are due to monitoring equipment malfunctions, nonmonitoring equipment malfunctions, quality assurance/quality control calibrations, other known causes, and other unknown causes.
9. The date of the latest CEMS and CPMS certification or audit.
10. A description of any changes in CEMS, CPMS, or controls since the last reporting period.

Add the following language:

11. An estimate of the quantity of each regulated pollutant emitted over the emission limits in §63.3320 for each monthly period covered in the report if the source failed to meet an applicable emission limit of this subpart

~~b) The permittee must submit startup, shutdown, and malfunction reports as specified in 40 CFR 63.10(d)(5), except that the provisions in subpart A of part 63 pertaining to startups, shutdowns, and malfunctions do not apply unless a control device is used to comply with this subpart.~~

Remove language. As of 7/9/2021, 63.10(d)(5) no longer applies under MACT JJJJ.

- ~~i. If actions taken by an owner or operator during a startup, shutdown, or malfunction of an affected source (including actions taken to correct a malfunction) are not consistent with the procedures specified in the affected source's SSMP required by 40 CFR 63.6(e)(3), the owner or operator must state such information in the report. The startup, shutdown, or malfunction report must consist of a letter containing the name, title, and signature of the responsible official who is certifying its accuracy and must be submitted to the Administrator.~~
- ~~ii. Separate startup, shutdown, and malfunction reports are not required if the information is included in the report specified in paragraph a.(2)(vi) of this section.~~

c) Additional semiannual reporting requirements.

- i. Monthly VOC emissions from the 4R coating line.
- ii. The twelve (12) month rolling total gallon usage of Methyl Ethyl Ketone (MEK) as a cleanup solvent for the 4R coating line as calculated each month.
- iii. The twelve (12) month rolling total gallon usage of Isopropyl Alcohol (IPA) as cleanup solvent for the 4R coating line as calculated each month.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

4R LINE

6. Specific Reporting Requirements (continued):

- iv. Monthly VOC emissions based on the mass of coating solids applied for the 4R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
- v. Monthly average overall VOC control efficiency for the 4R line, as necessary, when compliance with an emission limit is demonstrated based on overall control efficiency.
- vi. The permittee shall identify the operating scenario used during the reporting period.
- vii. The permittee shall identify the compliance option used during the reporting period for each coating line.

Replace the redlined language with the following:

The average combustion temperature in any 3-hour period must not fall more than 50 degrees Fahrenheit below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i).

7. Specific Control Equipment Operating Conditions:

a) Thermal Oxidizer.

~~The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3360(e)(3)(i).~~

- i. Collect the combustion temperature data according to 40 CFR 63.3350(e)(9);
- ii. ~~Maintain the 3-hour rolling average combustion temperature at or above the temperature limit.~~

b) Capture Systems.

Whenever a web coating line is operated, continuously monitor the operating parameters established in accordance with 40 CFR 63.3350(f) to ensure capture efficiency.

- i. Submit a capture system monitoring plan to the Division that identifies operating parameters to be monitored according to 40 CFR 63.3350(f).
- ii. Conduct monitoring according to the plan, 40 CFR 63.3350(f)(3).

Add the following language under 7.a Thermal Oxidizer:

ii. Maintain the 3 hour average combustion temperature no more than 50 degrees Fahrenheit lower than this average combustion temperature, 63.3360(e)(3)(i) (B).

c) Continuous parameter monitoring systems (CPMS), 40 CFR 63.3350(e).

- i. 3M Cynthiana records CPMS data every 4-minutes for a total of 15 data readings per hour. New 3-hour rolling averages will then be calculated every 4-minutes.
- ii. You must have valid data from at least 90 percent of the hours during which the process operated.
- iii. Twelve readings per hour must be from a monitoring system that is not out of control to be considered a valid hour of data, and;
- iv. Two hours of any consecutive 3-hour period must be valid to have a valid 3-hour average.
- v. Provided the conditions (1), (3), and (4) above are met, 3M will not be required to calculate hourly block averages or the 3-hour ~~rolling~~ average based on the hourly block averages required by 40 CFR 63.3350(e)(3) and (4).

Delete "rolling"

- d) **See Section E** for additional requirements including monitoring equipment installation, initial calibration, ongoing verification, and development of the Capture system monitoring plan.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)4R LINE**8. Alternate Operating Scenarios:**

Pursuant to 401 KAR 51:017, the permittee may operate the 4R line without any control devices, in which case the 4R line emission limitation is 0.08 kg VOC / kg of coatings solids applied based on a monthly average of all applicators in the 4R line. Alternatively, the permittee may operate the 4R line utilizing capture and control, in which case the permittee must achieve at least 98% overall VOC control on a monthly average for all applicators in the 4R line. The 4R line must be in compliance with either emission limit at all times, but it is not necessary to show compliance with both emission limitations at the same time. When making a change from one operating scenario to another, the permittee shall record contemporaneously in a log at the permitted facility a record of the scenario under which the facility is operating

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)5R LINE**1. Operating Limitations:**

See OVERALL requirements

2. Emission Limitations:

- a) **Limitations on VOC mass emissions under 401 KAR 51:017**, VOC emissions from 5R, after control, if any, shall not exceed 200 tons per year (tpy), based on a twelve (12) month rolling total of monthly VOC emissions.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
 - iii. The Permittee may reference Equations 1b, 8b and 11b in Attachment B for details.
- b) **Other emission limitations under 401 KAR 51:017**, VOC emissions from 5R, after control, if any, shall not exceed 0.14 kg/kg (0.14 lb/lb) coating solids applied, based on a monthly weighted average across all applicators / work stations of 5R.

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
 - ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
 - iii. The Permittee may reference Equations 1b, 8b, 10b and 11b in Attachment B for details.
- c) **Emission limitations issued pursuant to 401 KAR 59:212 5R and 6R Coating Lines.**

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)5R LINE**2. Emission Limitations (continued):**

- (1) 401 KAR 59:212, Section 6 (1), Utilize a waterborne ink (or coating) whose volatile portion consists of 75% (volume basis) water and 25% (volume basis) organic solvent (or a lower VOC content) for all applicators; or
- (2) 401 KAR 59:212, Section 6 (3), Utilize inks (or coatings) which, excluding water, contain $\geq 60\%$ (volume basis) nonvolatile material as applied to the substrate; or
- (3) 401 KAR 59:212, Section 6 (4), Utilize inks (or coatings) with an emission limit of 0.5 lb VOC/lb solids as delivered to the applicators.

Compliance Demonstration Method:

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
 - ii. Determine the VOC weight fraction and the density of inks and coating materials used in accordance with Appendix A to 40 CFR 60, Method 24A.
 - iii. Compliance through an exemption shall be demonstrated in accordance with the procedures and methods provided in Attachment B for this regulation.
- d) **Emission limitations under 40 CFR Part 63 Subpart JJJJ**, Subsumed by BACT limit of 0.14 lb VOC per lb coating solids applied monthly average.

3. Testing Requirements:

See OVERALL requirements

4. Specific Monitoring Requirements:

None

5. Specific Recordkeeping Requirements:

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);

- i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)5R LINE**5. Specific Recordkeeping Requirements (continued):**

1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as “never-controlled” workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;
 5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;
 6. The date for each application of coating, adhesive, graphic arts material, or solvent;
 7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.
- B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).
This record may take the form of a “library” of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.
- C. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
- D. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)5R LINE**5. Specific Recordkeeping Requirements (continued):**

- E. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
- F. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthiana February 2-18, 2009.
- G. Monthly VOC emissions from the 5R coating line.
- H. The twelve (12) month rolling total VOC emissions as calculated each month for the 5R coating line.
- I. Monthly VOC emissions based on the mass of coating solids applied for the 5R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
- J. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.

6. Specific Reporting Requirements:

- a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.
 - i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
 - ii. The compliance report must contain the information in paragraphs (2)(A) through (D) of this section:
 - A. Company name and address.
 - B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.
 - C. Date of report and beginning and ending dates of the reporting period.
 - D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

5R LINE

6. Specific Reporting Requirements (continued):

- b) Additional semiannual reporting requirements.
 - i. Monthly VOC emissions from the 5R coating line.
 - ii. The twelve (12) month rolling total VOC emissions as calculated each month for the 5R coating line.
 - iii. Monthly VOC emissions based on the mass of coating solids applied for the 5R line, as necessary, when compliance with an emission limit is demonstrated based on the mass of VOC emissions per mass of coating solids.
 - iv. The permittee shall identify the compliance option used during the reporting period for each coating line.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)6R LINE**1. Operating Limitations:**

See OVERALL requirements

2. Emission Limitations:**a) Emission limitations under 40 CFR Part 63 Subpart JJJJ**

These emissions standards apply to all of the noted applicators / work stations, whether considered individually, as a single collection, or as any combination thereof.

- i. ≤ 0.05 lb VOC per lb VOC applied; or
- ii. ≤ 0.04 lb VOC per lb coating materials applied; or
- iii. ≤ 0.20 lb VOC per lb coating solids applied

Compliance Demonstration Method:

- i. Compliance with each emissions limit shall be demonstrated by the 30th day following the end of each month.
- ii. Unless otherwise specified, the Permittee shall demonstrate compliance with the emissions limitations in this Section through the recordkeeping required by this section. Emissions shall be calculated through a mass balance, through the use of software such as Emission Master™, or through another method as approved by the Administrator in writing.
- iii. The Permittee may reference Equations 1b, 8b, 9b, 10b and 11b in Attachment B for details.

**b) Emission limitations issued pursuant to 401 KAR 59:212
5R and 6R Coating Lines.**

- (1) 401 KAR 59:212, Section 6 (1), Utilize a waterborne ink (or coating) whose volatile portion consists of 75% (volume basis) water and 25% (volume basis) organic solvent (or a lower VOC content) for all applicators; or
- (2) 401 KAR 59:212, Section 6 (3), Utilize inks (or coatings) which, excluding water, contain $\geq 60\%$ (volume basis) nonvolatile material as applied to the substrate; or
- (3) 401 KAR 59:212, Section 6 (4), Utilize inks (or coatings) with an emission limit of 0.5 lb VOC/lb solids as delivered to the applicators.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)6R LINE**2. Emission Limitations (continued):****Compliance Demonstration Method:**

- i. Compliance shall be demonstrated within twenty-four (24) hours following the end of each twenty-four (24) hour period.
- ii. Determine the VOC weight fraction and the density of inks and coating materials used in accordance with Appendix A to 40 CFR 60, Method 24A.
- iii. Compliance through an exemption shall be demonstrated in accordance with the procedures and methods provided in Appendix B for this regulation.

3. Testing Requirements:

See OVERALL requirements

4. Specific Monitoring Requirements:

None

5. Specific Recordkeeping Requirements:

Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.10(b)(2), the permittee shall maintain relevant records as follows for each web coating line.

- a) All required measurements and calculations needed to demonstrate compliance with the streamlined set of emissions limits listed above in Section B.2 of this permit (including, but not limited to, 15-minute averages of CMS data, raw performance testing measurements, and raw performance evaluation measurements, that support data that the source is required to report);
 - i. Specific information to be recorded shall include the following to the extent necessary to demonstrate compliance;
 - A. Daily records maintained by the source shall include, but not be limited to, the following:
 1. Applicable administrative regulation number;
 2. Application method and substrate type;
 3. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were exhausted to atmosphere (includes all cases of venting, such as “never-controlled” workstations, bypass of a control device, venting during startup, shutdown, malfunction, etc.);
 4. Amount and type of coating, adhesive, graphic arts material, or solvent used at each point of application, including exempt compounds during periods when emissions from that applicator were routed to a control device, including identification of the control device;

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)6R LINE**5. Specific Recordkeeping Requirements (continued):**

5. The VOC content as applied in each coating, adhesive, graphic arts material, or solvent;
 6. The date for each application of coating, adhesive, graphic arts material, or solvent;
 7. The amount of surface preparation, cleanup, or washup solvent (including exempt compounds) used and the VOC content of each; and
 8. Oven temperature, if applicable.
- B. For each coating, adhesive, graphic arts material, or solvent in use, the source shall keep a record of the material formation of each including:
1. Volatile organic content (%wt., or equivalent);
 2. Solids content (%wt., or equivalent);
 3. All properties (including but not limited to water and exempt solvent content) necessary to demonstrate compliance against a volumetric-based compliant coating (e.g. 2.9 lb/gal);
 4. The results of any reference method 24, 24a, or 311 tests or the manufacturer's formulation data in the form of Material Safety Data Sheets (MSDS) or Certified Product Data Sheets (CPDS).
This record may take the form of a "library" of coating materials which needs to be updated only when new materials are added or existing materials are reformulated.
- C. Organic HAP content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(c);
- D. Volatile matter and coating solids content data for the purpose of demonstrating compliance in accordance with the requirements of 40 CFR 63.3360(d);
- E. Material usage, organic HAP usage, VOC usage, and coating solids usage and compliance demonstrations using these data in accordance with the requirements of 40 CFR 63.3370(b), (c), and (d).
- F. Maintain monthly records of the amount of any solvent containing materials recovered and shipped off site for disposal. For this the permittee may record the amount of clean-up solvent used and apply the site specific clean-up solvent emission factor of 15%, as determined by the clean-up solvent tracking study performed at 3M Cynthia February 2-18, 2009.
- G. Monthly VOC emissions from the 6R coating line.
- H. Maintain a record (beginning and end dates and times) when the permittee switches from one compliance option to another for each coating line.
- I. The mass of VOC applied per mass of coating material, or the mass of VOC applied per mass of coating solids.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

6R LINE

6. Specific Reporting Requirements:

- a) Pursuant to 401 KAR 52:020, Section 26, incorporating by reference the *Cabinet Provisions and Procedures for Issuing Title V Permits* and 40 CFR 63.3400, the permittee must submit a semiannual compliance report according to paragraphs (i) and (ii) below.
 - i. The semiannual compliance report may be submitted as part of the semiannual reporting required by Section F.5 and F.6.
 - ii. The compliance report must contain the information in paragraphs (2)(A) through (D) of this section:
 - A. Company name and address.
 - B. Statement by a responsible official with that official's name, title, and signature certifying the accuracy of the content of the report.
 - C. Date of report and beginning and ending dates of the reporting period.
 - D. If there are no deviations from any emission limitations (emission limit or operating limit) that apply to you, a statement that there were no deviations from the emission limitations during the reporting period.
- b) Additional semiannual reporting requirements.
 - i. Monthly VOC emissions from the 6R coating line.
 - ii. The permittee shall identify the compliance option used during the reporting period for each coating line.
 - iii. The mass of VOC applied per mass of coating material, or the mass of VOC applied per mass of coating solids for the 6R line as calculated each month.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

SOLVENT COMPOUNDING

EP 154 Primer Mix Tank (Room 154)

Description: Located in Room 154, this vessel is used to create water-based products

APPLICABLE REGULATIONS:

Add the following language:

, as applicable

401 KAR 63:002 Section 2(4)(mmmm), 40 C.F.R. 63.7980 to 63.8105, Tables 1 to 10 (Subpart HHHHH), National Emission Standards for Hazardous Air Pollutants: Miscellaneous Coating Manufacturing

1. **Operating Limitations:**

See 2. **Emission Limitation**

2. **Emission Limitations:**

As an alternative to complying with individual stationary processes with a 5 weight percent HAP, manufacture coatings with a permittee may only comply with coatings that contain less than 5 weight percent HAP below. [40 CFR 63.8055]

Replace redline language with the following updated language from §63.8055(b)(1)-(4):

The permittee may only comply with the alternative during the production of coatings that contain less than 5 weight percent HAP, as determined using any of the procedures specified in paragraphs (b)(1) through (4) of this section.

(1) Method 311 (appendix A to this part). As an alternative to Method 311, you may use California Air Resources Board Method 310, Determination of Volatile Organic Compounds (VOC) in Consumer Products and Reactive Organic Compounds (ROC) in Aerosol Coating Products (incorporated by reference, see § 63.14) for use with aerosol cans.

(2) Method 24 (appendix A to 40 CFR part 60). You may use Method 24 to determine the mass fraction of volatile matter and use that value as a substitute for the mass fraction of HAP, or one of the alternatives in paragraphs (b)(2)(i) through (iii) of this section.

(i) ASTM D2369-10 (Reapproved 2015)e1, (incorporated by reference, see § 63.14);

(ii) ASTM D2697-03 (Reapproved 2014) (incorporated by reference, see § 63.14); or

(iii) ASTM D3960-98 (incorporated by reference, see § 63.14).

(3) You may use an alternative test method for determining mass fraction of HAP if you obtain prior approval by the Administrator. You must follow the procedure in § 63.7(f) to submit an alternative test method for approval.

(4) You may rely on formulation data from raw material suppliers if it represents each organic HAP that is present at 0.1 percent by mass or more for the HAP listed in Table 11 to this subpart, and at 1.0 percent by mass or more for other compounds. If the HAP weight percent estimated based on formulation data conflicts with the results of a test conducted according to paragraphs (b)(1) through (3) of this section, then there is a rebuttal presumption that the test results are accurate unless, after consultation, you demonstrate to the satisfaction of the permitting authority that the test results are not accurate and that the formulation data are more appropriate.

Compliance Demonstration Method:

- a) ~~Method 311 (appendix A to 40 CFR part 63).~~
- b) ~~Method 24 (appendix A to 40 CFR part 60). The permittee may use Method 24 to determine the mass fraction of volatile matter and use that value as a substitute for the mass fraction of HAP.~~
- c) ~~The permittee may use an alternative test method for determining mass fraction of HAP if prior approval is obtained by the Administrator. The procedure in 40 CFR 63.7(f) must be followed to submit an alternative test method for approval.~~
- d) ~~The permittee may rely on formulation data from raw material suppliers if it represents each organic HAP that is present at 0.1 percent by mass or more for OSHA-defined carcinogens, as specified in 29 CFR 1910.1200(d)(4), and at 1.0 percent by mass or more for other compounds. If the HAP weight percent estimated based on formulation data conflicts with the results of a test conducted according to paragraphs (b)(1) through (3) of this section, there is a rebuttal presumption that the test results are accurate unless, after consultation, the permittee demonstrates to the satisfaction of the permitting authority that the test results are not accurate and that the formulation data are more appropriate.~~

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

SOLVENT COMPOUNDING

3. Testing Requirements:

None

4. Specific Monitoring Requirements:

None

5. Specific Recordkeeping Requirements:

None

6. Specific Reporting Requirements

Compliance report as required in 40 CFR Part 63, Subpart HHHHH. The report shall contain the information specified in 40 CFR 63.8075(e)(1) through (8)

Add the following language:
Beginning on and after August 14, 2023, subsequent compliance reports must be submitted via CEDRI in accordance with 63.8075 (h) and (k).

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

EP08 (08) Two (2) Natural Gas Fired Boilers

Description: (2) Cleaver Brooks, Indirect Heat Exchangers
Natural gas-fired
Maximum continuous rating: 12.5 million Btu / hour (MMBtu/hr) each
Installed: April 11, 1985
Control Equipment: None

EP21 (21) One (1) Natural Gas Fired Boiler

Description: Kewanee Indirect Heat Exchanger
Natural gas-fired
Maximum continuous rating: 16.74 MMBtu/hr
Installed: June 5, 1989
Control Equipment: None

EP32 (32) One (1) Natural Gas Fired Boiler

Description: Tampella Indirect Heat Exchanger
Natural gas-fired
Maximum continuous rating: 39.04 MMBtu/hr
Installed: July 29, 1991
Control Equipment: None

APPLICABLE REGULATIONS:

401 KAR 59:015. New indirect heat exchangers.

401 KAR 60:005 Section 2(2)(d), 40 C.F.R. 60.40c to 60.48c (Subpart Dc), Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units. Applies to EP32 only.

401 KAR 63:002 Section 2(4)(iii), 40 C.F.R. 63.7480 to 63.7575, Tables 1 to 13 (Subpart DDDDD), National Emission Standards for Hazardous Air Pollutants for Major Sources: Industrial, Commercial, and Institutional Boilers and Process Heaters.

1. Operating Limitations:

- a) The permittee shall meet each work practice standard in Table 3 to 40 CFR 63, Subpart DDDDD that applies to each boiler except as provided under 40 CFR 63.7522. [40 CFR 63.7500(a)(1)]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

1. Operating Limitations (continued):

- b) At all times, the permittee shall operate and maintain the affected source, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Administrator that may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the source. [40 CFR 63.7500(a)(3)]
- c) The permittee shall conduct a tune-up once annually to demonstrate continuous compliance as specified in 40 CFR 63.7540(a)(10)(i)-(vi). This frequency does not apply to limited-use boilers and process heaters, as defined in 40 CFR 63.7575, or units with continuous oxygen trim systems that maintain an optimum air to fuel ratio. [40 CFR 63.7540(a)(10)]
- i. As applicable, inspect the burner, and clean or replace any components of the burner as necessary ~~(the permittee may delay the burner inspection until the next scheduled unit shutdown);~~
 - ii. Inspect the flame pattern, as applicable, and adjust the burner as necessary to optimize the flame pattern. The adjustment should be consistent with the manufacturer's specifications, if available;
 - iii. Inspect the system controlling the air-to-fuel ratio, as applicable, and ensure that it is correctly calibrated and functioning properly (the permittee may delay the inspection until the next scheduled unit shutdown); and
 - iv. Optimize total emissions of carbon monoxide. This optimization should be consistent with the manufacturer's specifications, if available.
 - v. Measure the concentrations in the effluent stream of CO in parts per million, by volume, and oxygen in volume percent, before and after the adjustments are made (measurements may be either on a dry or wet basis, as long as it is the same basis before and after the adjustments are made). Measurements may be taken using a portable CO analyzer; and
 - vi. Maintain on-site and submit, if requested by the Administrator, an annual report containing the information in paragraphs (a)(10)(vi)(A) through (C) of 40 CFR 63.7540:
 - 1) The concentrations of CO in the effluent stream in parts per million by volume, and oxygen in volume percent, measured at high fire or typical operating load, before and after the tune-up of the boiler or process heater;
 - 2) A description of any corrective actions taken as a part of the tune-up; and
 - 3) The type and amount of fuel used over the 12 months prior to the tune-up, but only if the unit was physically and legally capable of using more than one type of fuel during that period. Units sharing a fuel meter may estimate the fuel used by each unit.
- d) If the unit is not operating on the required date for a tune-up, the tune-up shall be conducted within 30 calendar days of startup. [40 CFR 63.7540(a)(13)]

Request redline language with the following to match regulatory language:

you may perform the burner inspection at any time prior to the tune-up or delay the burner inspection until the next scheduled unit shutdown

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

1. Operating Limitations (continued):

- e) The permittee shall conduct an annual performance tune-up according to 40 CFR 63.7540(a)(10). Each annual tune-up specified in 40 CFR 63.7540(a)(10) shall be no more than 13 months after the previous tune-up. For a new or reconstructed affected source (as defined in 40 CFR 63.7490), the first annual tune-up shall be no later than 13 months after the initial startup of the new or reconstructed affected source. [40 CFR 63.7515(d)]
- f) As provided in 40 CFR 63.6(g), EPA may approve use of an alternative to the work practice standards in 40 CFR 63, Subpart DDDDD. [40 CFR 63.7500(b)]

Compliance Demonstration Method:

- i. The permittee shall demonstrate continuous compliance with each applicable work practice standard in Table 3 to 40 CFR 63, Subpart DDDDD according to the methods specified in Table 8 to 40 CFR 63, Subpart DDDDD and paragraphs (a)(1) through (19) of 40 CFR 63.7540. [40 CFR 63.7540(a)]
- ii. The permittee shall conduct a tune-up of each boiler or process heater as specified in 40 CFR 63.7540(a)(10)(i) through (vi) to demonstrate continuous compliance. [40 CFR 63.7540(a)(11)]

2. Emission Limitations:

Update reference to 40 CFR 63.7540(a)(10), not (11)

Opacity Limits

- a) 401 KAR 59:015, Section 4(2) limits visible emissions from each stack to less than 20% opacity except:

4(2)(b) A maximum of 40% opacity shall be permissible for not more than 6 consecutive minutes in any 60 consecutive minutes during cleaning the firebox or blowing soot.

4(2)(c) For emissions from an indirect heat exchanger during building a new fire for the period required to bring the boiler up to operating conditions provided the method used is that recommended by the manufacturer and the time does not exceed the manufacturer's recommendations.

Compliance Demonstration Method:

The boilers are considered to be in compliance when firing natural gas.

Emission Point (8) – PM and SO₂ Emissions Limitations

- b) 401 KAR 59:015, Section 4(1)(c) limits emissions of particulate matter to 0.45 pounds per million BTU actual heat input.

Compliance Demonstration Method:

The boilers are considered to be in compliance when firing natural gas.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

2. Emission Limitations (continued):

- c) 401 KAR 59:015, Section 5(1)(c) limits emissions of sulfur dioxide to 2.06 pounds per million BTU actual heat input.

Compliance Demonstration Method:

The boilers are considered to be in compliance when firing natural gas.

Emission Point (21) – PM and SO₂ Emissions Limitations

- d) 401 KAR 59:015, Section 4(1)(c) limits emissions of particulate matter to 0.40 pounds per million BTU actual heat input.

Compliance Demonstration Method:

The boiler is considered to be in compliance when firing natural gas.

- e) 401 KAR 59:015, Section 5(1)(c) limits emissions of sulfur dioxide to 1.67 pounds per million BTU actual heat input.

Compliance Demonstration Method:

The boiler is considered to be in compliance when firing natural gas.

Emission Point (32) – PM and SO₂ Emissions Limitations

- f) 401 KAR 59:015, Section 4(1)(c) limits emissions of particulate matter to 0.34 pounds per million BTU actual heat input.

Compliance Demonstration Method:

The boiler is considered to be in compliance when firing natural gas.

- g) 401 KAR 59:015, Section 5(1)(c) limits emissions of sulfur dioxide to 1.27 pounds per million BTU actual heat input..

Compliance Demonstration Method:

The boiler is considered to be in compliance when firing natural gas.

- h) Boilers and process heaters in units designed to burn natural gas are not subject to the emission limits in Tables 1 and 2 or 11 through 13 to 40 CFR 63, Subpart DDDDD, or the operating limits in Table 4 to 40 CFR 63, Subpart DDDDD. [40 CFR 63.7500(e)]

3. Testing Requirements:

Testing shall be conducted at such times as may be required by the Cabinet in accordance with 401 KAR 50:045 and 401 KAR 59:005.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**BOILERS****4. Specific Monitoring Requirements:**

The permittee shall monitor the amount of each fuel burned.

Request the following citation language be added to item 5.a:
40 CFR 60.48c(g)(2)

5. Specific Recordkeeping Requirements:

- a) The permittee shall keep a monthly record of the amount of each fuel used.
- b) The permittee shall keep all records of regular maintenance and any necessary repairs to the equipment.
- c) The permittee shall maintain on-site and submit, if requested by the Division, an annual report containing information from the annual tune-up, as specified in 40 CFR 63.7540(a)(10)(vi)(A).
- d) The permittee shall keep a copy of each notification and report submitted to demonstrate compliance with 40 CFR 63 Subpart DDDDD.
- e) The following requirements shall be met: [40 CFR 63.7560]
 - i. Records shall be in a form suitable and readily available for expeditious review, according to 40 CFR 63.10(b)(1).
 - ii. As specified in 40 CFR 63.10(b)(1), the permittee shall keep each record for 5 years following the date of each occurrence, measurement, maintenance, corrective action, report, or record.
 - iii. The permittee shall keep each record on site, or they shall be accessible from on site (for example, through a computer network), for at least 2 years after the date of each occurrence, measurement, maintenance, corrective action, report, or record, according to 40 CFR 63.10(b)(1). The permittee may keep the records off site for the remaining 3 years.

6. Specific Reporting Requirements:

- a) If the permittee switches fuels or makes a physical change to the boiler and the fuel switch or physical change resulted in the applicability of a different subcategory, the permittee shall provide notice of the date upon which the permittee switched fuels or made the physical change within 30 days of the switch/change. The notification shall identify: [40 CFR 63.7545(h)]
 - i. The name of the permittee, as defined in 40 CFR 63.7490, the location of the source, the boiler(s) and process heater(s) that have switched fuels, were physically changed, and the date of the notice.
 - ii. The currently applicable subcategory under 40 CFR 63, Subpart DDDDD.
 - iii. The date upon which the fuel switch or physical change occurred.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

6. Specific Reporting Requirements (continued):

Request the following be added between "each" and "report" to provide clarity and match regulatory language:

applicable

- b) The Florence Regional Office shall be notified of modifications (as defined in 401 KAR 59:001) to this affected facility. This notice shall be sent 60 days or as soon as practicable before the change is commenced and shall include information describing the precise nature of the change, present and proposed emission control systems, productive capacity of the facility before and after the change, and the expected completion date of the change. The Cabinet may request additional relevant information subsequent to this notice. [40 CFR 60.7(a)(4), 401 KAR 59:005 Section 3(1)(d)]
- c) ~~The permittee shall submit each report required by Table 9 to 40 CFR 63, Subpart DDDDD electronically using CEDRI that is accessed through the EPA's Central Data Exchange (CDX) (www.epa.gov/cdx). However, if the reporting form specific to 40 CFR 63, Subpart DDDDD is not available in CEDRI at the time that the report is due the permittee shall submit the report to the Administrator at the appropriate address listed in 40 CFR 63.13. At the discretion of the Administrator, the permittee may also submit these reports to the Administrator in the format specified by the Administrator. [40 CFR 63.7550(a), 40 CFR 63.7550(h)(3)]~~
- d) Unless the EPA Administrator has approved a different schedule for submission of reports under 40 CFR 63.10(a), the permittee shall submit each report, according to paragraph (h) of 40 CFR 63.7550, by the date in Table 9 to 40 CFR 63, Subpart DDDDD and according to the requirements in paragraphs (b)(1) through (4) of 40 CFR 63.7550. For units that are subject only to a requirement to conduct an annual tuneup, according to 40 CFR 63.7540(a)(10) ~~or (11) respectively~~, and not subject to emission limits or operating limits, the permittee may submit only an annual ~~or biennial~~ compliance report, as specified in paragraphs (b)(1) through (4) of 40 CFR 63.7550, instead of a semi-annual compliance report. [40 CFR 63.7550(b)]
- i. The first compliance report shall cover the period beginning on the compliance date that is specified for each boiler or process heater in 40 CFR 63.7495 and ending on December 31, within 1 year as applicable after the compliance date that is specified for the permittee in 40 CFR 63.7495.
 - ii. The first annual compliance report shall be postmarked or submitted no later than January 31.
 - iii. Each subsequent annual compliance report shall cover the applicable 1 year periods from January 1 to December 31.
 - iv. Each subsequent annual compliance report shall be postmarked or submitted no later than January 31.
- e) A compliance report shall contain the following information: [40 CFR 63.7550(c)(1)]
- i. Company and Facility name and address.
 - ii. Process unit information, emissions limitations, and operating parameter limitations.
 - iii. Date of report and beginning and ending dates of the reporting period.
 - iv. The total operating time during the reporting period.

Remove redline language and replace with the following to match regulatory text:

Instead of using the electronic report in CEDRI for this subpart, you may submit an alternate electronic file consistent with the XML schema listed on the CEDRI Web site (<http://www.epa.gov/ttn/chieff/cedri/index.html>), once the XML schema is available. If the reporting form specific to this subpart is not available in CEDRI at the time that the report is due, you must submit the report to the Administrator at the appropriate address listed in § 63.13. You must begin submitting reports via CEDRI no later than 90 days after the form becomes available in CEDRI.

Proposed deleting redline language. Item (a)(11) is applicable to boilers less than 10 MMBtu/hr and all of the units are greater than 10 MMBtu/hr and covered under item (a)(10).

Request the following be added before "operating limits" to provide clarity and match regulatory language:

Table 4

Request the following be added before "first" and "compliance" to provide clarity and match existing language in items ii, iii, and iv:

Delete "or biennial." Only annual reports are required.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

BOILERS

6. Specific Reporting Requirements (continued):

- v. Include the date of the most recent tune-up for each unit subject to only the requirement to conduct an annual tune-up according to 40 CFR 63.7540(a)(10). Include the date of the most recent burner inspection if it was not done annually and was delayed until the next scheduled or unscheduled unit shutdown.
 - vi. Statement by responsible official with that official's name, title and signature, certifying the truth, accuracy, and completeness of the content of the report
- f) The permittee shall report each instance in which an applicable work practice standard in Table 3 to 40 CFR 63, Subpart DDDDD was not met. These deviations shall be reported according to the requirements in 40 CFR 63.7550. [40 CFR 63.7540(b)]

7. Specific Control Equipment Operating Conditions:

None

8. Alternate Operating Scenarios:

None

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

EU 67 15 J POLYPROPYLENE EXTRUSION LINE

APPLICABLE REGULATIONS:

401 KAR 59:010, New process operations

Add the following emission units associated with the 15J Polypropylene Extrusion Line. Units were previously associated with 15J and are requested to be individually listed in the permit:

EU 68 Corona Treater 1
EU 69 Corona Treater 2

401 KAR 63:020, Potentially Hazardous Matter and Toxic Substance Emissions

1. Operating Limitations:

Pursuant to 401 KAR 59:010, all particulate filters and control equipment shall be in place and functional at all times of operation.

2. Emission Limitations:

a. **Standard for Particulate Matter (401 KAR 59:010 Section 3(2)):**

Emission of particulate matter from a control device or stack of any affected facility up to a process rate of 1000 lbs/hr shall not exceed **2.34** lbs/hr. For processing rates greater than 1000 lbs/hr up to 60,000 lbs/hr, particulate emissions shall not exceed the emission rate calculated by the following equation:

$$E = 3.59(P)^{0.62}$$

E = the PM emissions rate (pounds/hour)

P = the process rate (tons/hour)

Compliance Demonstration Method:

The source is considered to be in compliance when the emission points are operating and properly maintained according to the manufacturer's recommendations. Refer to Subsection 4. Monitoring Requirements.

b. **Standard for Opacity (401KAR 59:010 Section (3)):**

The permittee shall not cause, suffer, allow, or permit any continuous emission into the open air from a control device or stack associated with any affected facility (s) which is equal to or greater than twenty (20) percent opacity.

Compliance Demonstration Method:

Refer to Subsection 4. Monitoring Requirements.

c. **401 KAR 63:020, Section 3;**

The permittee shall not allow any affected facility to emit potentially hazardous matter or toxic substances in such quantities or duration as to be harmful to the health and welfare of humans, animals and plants.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**15 J POLYPROPYLENE EXTRUSION LINE****2. Emission Limitations (continued):****Compliance Demonstration Method:**

The Cabinet determines that source is in compliance with 401 KAR 63:020 based on the rate of emissions of airborne toxics determined by the cabinet using information provided in the application and any supplemental information submitted by the source.

3. Testing Requirements:

Testing shall be conducted at such times as may be required by the Cabinet in accordance with 401 KAR 59:005, Section 2(2) and 401 KAR 50:045, Section 4.

4. Specific Monitoring Requirements:

Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack no less than weekly and maintaining a log of the observations. If visible emissions from the stacks are seen (not including condensed water in the plume), then an inspection of control equipment shall be initiated and corrective action taken. If visible emissions are present after the corrective action, the permittee may determine the opacity using Reference Method 9.

5. Specific Recordkeeping Requirements:

- a. The permittee shall maintain records of corrective actions taken because of visible emissions from a stack, including date and time.
- b. The permittee shall maintain records of the weekly visual observations.
- c. The permittee shall maintain records of any Reference Method 9 readings performed.

6. Specific Reporting Requirements:

When corrective actions are required due to an opacity exceedance as noted in **Emission Limitations** the permittee shall submit the following information from the control device inspection and repair log.

- a. A description of the deviation,
- b. The date and time period of the deviation, and
- c. Actions taken to correct the deviation.
- d. A statement of the cause of each deviation.

Copies of these records shall be submitted as a part of the semiannual reporting as required in **Section F, Subsection 5, and 6**

7. Specific Control Equipment Operating Conditions:

All filters shall be maintained and operated in accordance with the manufacturer's recommendations.

8. Alternate Operating Scenarios:

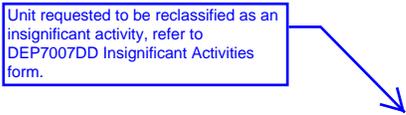
None

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

RESIN HANDLING & RECYCLING

- 15J-1 (15J-1) Resin Conveying System**
Barron Pellet Feed Hopper with Cyclonic Separator (1994)
- 15J-16 (15J-16) Fluff Hopper 1**, Barron VSH900-1DS6 Vertical Storage Hopper
Maximum continuous rating: 950 lb/hr
Installed: 1994
- 15J-17 (15J-17) Fluff Hopper 2**, Barron VSH900-1DS6 Vertical Storage Hopper
Maximum continuous rating: 950 lb/hr
Installed: 1994
- 15J-18 (15J-18) (2) Custom Vertical Pellet Hoppers** w/ single tube pellet headers
Maximum continuous rating: 1200 lb/hr
Installed: 1994
- 15J-19 (15J-19) Grinder**
Pelletizer, Gamma Meccenica
Control Equipment: Baghouse
~~**Pellet Dryer, Beringer Air Dryer**~~
~~Maximum continuous rating: 1200 lb/hr~~
~~Control Equipment: Baghouse~~
~~Installed: 1994~~
- 15J-23 (15J-23) (2) Alpine Grinders**
Installed: 2/1989
- 15J-24 (15J-24) Pellet Feed Hopper**
Maximum continuous rating: 5000 lb/hr
Control Equipment: Cyclonic Separator
- 15J-25 (15J-25) Day Tank 1**, Columbian Tectank Vertical Storage Tank
Maximum continuous rating: 4500 lb/hr
Control Equipment: None
Installed: 2002
- 15J-26 (15J-26) Day Tank 2**, Columbian Tectank Vertical Storage Tank
Maximum continuous rating: 4500 lb/hr
Control Equipment: None
Installed: 2002
- 15J-27 (15J-27) Day Tank 3**, Columbian Tectank Vertical Storage Tank
Maximum continuous rating: 3500 lb/hr
Control Equipment: Baghouse
Installed: 2002

Unit requested to be reclassified as an insignificant activity, refer to DEP7007DD Insignificant Activities form.



SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

RESIN HANDLING & RECYCLING

- 15J-29 (15J-29)** **HD Silo**, Dachin Kreyenborg & Co. Gimbt Vertical Storage Silo
Control Equipment: Baghouse
Installed: 1994
- 15J-30 (15J-30)** **LD Silo**, Dachin Kreyenborg & Co. Gimbt Vertical Storage Silo
Control Equipment: Baghouse
Installed: 1994
- 15J-31 (15J-31)** **(2) Virgin Silos**
Maximum continuous rating: 30,000 lbs/hr

APPLICABLE REGULATIONS:

401 KAR 59:010, New process operations

401 KAR 63:020, Potentially Hazardous Matter and Toxic Substance Emissions

1. Operating Limitations:

Pursuant to 401 KAR 59:010, all particulate filters and control equipment shall be in place and functional at all times of operation.

2. Emission Limitations:

a. Standard for Particulate Matter (401 KAR 59:010 Section 3(2)):

Emission of particulate matter from a control device or stack of any affected facility up to a process rate of 1000 lbs/hr shall not exceed **2.34** lbs/hr. For processing rates greater than 1000 lbs/hr up to 60,000 lbs/hr, particulate emissions shall not exceed the emission rate calculated by the following equation:

$$E = 3.59(P)^{0.62}$$

E = the PM emissions rate (pounds/hour)

P = the process rate (tons/hour)

Compliance Demonstration Method:

The source is considered to be in compliance when the emission points are operating and properly maintained according to the manufacturer's recommendations. Refer to Subsection **4. Monitoring Requirements.**

b. Standard for Opacity (401KAR 59:010 Section (3)):

The permittee shall not cause, suffer, allow, or permit any continuous emission into the open air from a control device or stack associated with any affected facility (s) which is equal to or greater than twenty (20) percent opacity.

Compliance Demonstration Method:

Refer to Subsection **4. Monitoring Requirements.**

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**RESIN HANDLING & RECYCLING****2. Emission Limitations (continued):****c. 401 KAR 63:020, Section 3;**

The permittee shall not allow any affected facility to emit potentially hazardous matter or toxic substances in such quantities or duration as to be harmful to the health and welfare of humans, animals and plants.

Compliance Demonstration Method:

The Cabinet determines that source is in compliance with 401 KAR 63:020 based on the rate of emissions of airborne toxics determined by the cabinet using information provided in the application and any supplemental information submitted by the source.

3. Testing Requirements:

Testing shall be conducted at such times as may be required by the Cabinet in accordance with 401 KAR 59:005, Section 2(2) and 401 KAR 50:045, Section 4.

4. Specific Monitoring Requirements:

Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack no less than weekly and maintaining a log of the observations. If visible emissions from the stacks are seen (not including condensed water in the plume), then an inspection of control equipment shall be initiated and corrective action taken. If visible emissions are present after the corrective action, the permittee may determine the opacity using Reference Method 9.

5. Specific Recordkeeping Requirements:

- a. The permittee shall maintain records of corrective actions taken because of visible emissions from a stack, including date and time.
- b. The permittee shall maintain records of the weekly visual observations.
- c. The permittee shall maintain records of any Reference Method 9 readings performed.

6. Specific Reporting Requirements:

When corrective actions are required due to an opacity exceedance as noted in **Emission Limitations** the permittee shall submit the following information from the control device inspection and repair log.

- a. A description of the deviation,
- b. The date and time period of the deviation, and
- c. Actions taken to correct the deviation.
- d. A statement of the cause of each deviation.

Copies of these records shall be submitted as a part of the semiannual reporting as required in **Section F, Subsection 5, and 6**

7. Specific Control Equipment Operating Conditions:

The filters shall be maintained and operated in accordance with the manufacturer's recommendations.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

HAP STORAGE TANKS

T3	(T3)	Toluene Storage Tank, Tank T3 12' dia. x18', white, 15000 gallon installed 1985
TR1	(TR1)	Tank Farm Transfer Racks Unloading of tank trucks into Tanks RT1, RT2, T1A and T1B
CTR	(CTR)	Container Transfer Rack: Room 161 Unloading of material (toluene) into containers within Room 161

Remove RT1, RT2, T1A, and T1B from the list. Materials associated with RT1, RT2, T1A, and T1B contain less than 5% HAP, so the materials are not considered organic liquids under MACT EEEE.

Add the following item to the list in place of redlined language (only T3 should be listed).

T3

Replace redline language with the following to more accurately reflect operations:

HAP storage tank(s)

Description: Included with the ~~two (2) HAP storage tanks~~ above are the transfer rack(s) at which organic liquids are unloaded out of transport vehicles and into the storage tanks; the transport vehicles themselves while they are unloading organic liquids at transfer racks; and equipment leak components in organic liquids service that are associated with pipelines and with storage tanks and transfer racks storing, loading, or unloading organic liquids.

APPLICABLE REGULATIONS:

401 KAR 63:002 Section 2(4)(kkk), 40 C.F.R. 63.2330 to 63.2406, Tables 1 to 12 (Subpart EEEE), National Emission Standards for Hazardous Air Pollutants: Organic Liquids Distribution (Non-Gasoline)

Add the following language:

, as applicable

1. Operating Limitations:

None

2. Emission Limitations:

None

3. Testing Requirements:

None

4. Specific Monitoring Requirements:

None

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

HAP STORAGE TANKS

5. Specific Recordkeeping Requirements:

40 CFR 63.2343 (b)(3)

- a) For each storage tank subject to this subpart having a capacity of 18.9 cubic meters (5,000 gallons) or more that is not subject to control based on the criteria specified in Table 2 to Subpart EEEE, items 1 through 6, the permittee must keep documentation, including a record of the annual average true vapor pressure of the total Table 1 organic HAP in the stored organic liquid, that verifies the storage tank is not required to be controlled under this subpart. The documentation must be kept up-to-date and must be in a form suitable and readily available for expeditious inspection and review according to 40 CFR 63.10(b)(1), including records stored in electronic form in a separate location.

Request to delete paragraph 5.b since it is not from MACT 4E. If this is a state-only requirement, a citation is requested to clarify the source of the language, with the redline edits incorporated.

Add the following:
true

- b) If the permittee changes the liquids stored in such tanks, the permittee is required to make a determination as to whether or not the vapor pressure of the new liquid being stored is sufficient to require control and maintain a record of that determination, even if control is still not required.

Add the following language:

, such that the estimated true vapor pressure for the liquid currently stored in the tank does not represent the proposed new liquid,

6. Specific Reporting Requirements:

Replace redlined language with the following:
meets the criteria for control under MACT 4E

Initial Compliance report must contain all information specified below.

- (1) Company name and address, 40 CFR 63.2386(c)(1).
 - (2) Statement by a responsible official, including the official's name, title, and signature, certifying that, based on information and belief formed after reasonable inquiry, the statements and information in the report are true, accurate, and complete, 40 CFR 63.2386(c)(2).
 - (3) Date of report and beginning and ending dates of the reporting period, 40 CFR 63.2386(c)(3).
 - (4) A listing of all transfer racks (except those racks at which only unloading of organic liquids occurs) and of tanks greater than or equal to 18.9 cubic meters (5,000 gallons) that are part of the affected source but are not subject to any of the emission limitations, operating limits, or work practice standards of this subpart, 40 CFR 63.2386(c)(10)(i).
- b) If one or more of the events listed in paragraphs b(1) through b(4) below occurred since the filing of the Notification of Compliance Status or the last Compliance report, the permittee shall submit a subsequent Compliance report, 40 CFR 63.2343(d).
- (1) Any storage tank or transfer rack became subject to control under this subpart EEEE; or
 - (2) Any storage tank equal to or greater than 18.9 cubic meters (5,000 gallons) became part of the affected source but is not subject to any of the emission limitations, operating limits, or work practice standards of this subpart; or
 - (3) Any transfer rack (except those racks at which only unloading of organic liquids occurs) became part of the affected source; or
 - (4) Any of the information required in paragraphs a(1) through a(3) as listed above [40 CFR 63.2386(c)(1), 40 CFR 63.2386(c)(2), or 40 CFR 63.2386(c)(3)] has changed.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

HAP STORAGE TANKS

6. Specific Reporting Requirements (continued):

c) Compliance reports must cover the semiannual reporting period from January 1 through June 30 or the semiannual reporting period from July 1 through December 31 and may be submitted along with the semi-annual reporting as required by Section F (5) and (6) of this permit. If none of the items in paragraphs b(1) through b(4) as listed above occurred during the previous Compliance reporting period, the permittee is not required to submit the semi-annual compliance report.

d) Subsequent Compliance reports must contain the information in ~~paragraphs (a)(1) through (a)(4) of this section and, where applicable, the information in (d)(1) through (d)(4) below.~~

~~(1) A listing of any storage tank that became subject to controls based on the criteria for control specified in Table 2 to Subpart EEEE, items 1 through 6, since the filing of the last Compliance report, 40 CFR 63.2386(d)(3)(i).~~

~~(2) A listing of any transfer rack that became subject to controls based on the criteria for control specified in Table 2 to Subpart EEEE, items 7 through 10, since the filing of the last Compliance report, 40 CFR 63.2386(d)(3)(ii).~~

~~(3) A listing of tanks greater than or equal to 18.9 cubic meters (5,000 gallons) that became part of the affected source but are not subject to any of the emission limitations, operating limits, or work practice standards of this subpart, since the last Compliance report, 40 CFR 63.2386(d)(4)(i).~~

~~(4) A listing of all transfer racks (except those racks at which only the unloading of organic liquids occurs) that became part of the affected source but are not subject to any of the emission limitations, operating limits, or work practice standards of this subpart, since the last Compliance report, 40 CFR 63.2386(d)(4)(ii).~~

Please update this paragraph to reflect revised MACT 4E language of 63.2386(d).

Please also include, as per 63.2386(d), 63.2386(c)(1)-(9) and (c)(12) in the additions.

7. Specific Control Equipment Operating Conditions:

None

8. Alternate Operating Scenarios:

None

SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**MAINTENANCE SPRAY BOOTH****09 (PSB-1) Spray Paint Booth for Facility Maintenance Operations**

Manufacturer: Devilbiss

Maximum continuous rating: 0.25 gal/hour

Emission Controls: dry filters (90% eff.)

Construction commenced: November 1985

Maintenance spray booth is requested to be reclassified as a trivial activity, with permit requirements removed, since it is only used to maintain process equipment and would be considered a plant maintenance/upkeep activity.

Reference: Kentucky Division for Air Quality, Permit Review Branch List of Trivial Activities, Item 12: Plant maintenance and upkeep activities (e.g., grounds keeping, general repairs, cleaning, painting, welding, plumbing, re-tarring roofs, installing insulation and paving parking lots), providing these activities are not conducted as part of a manufacturing process, are not related to the source's primary business activity and do not otherwise trigger a permit modification.

APPLICABLE REGULATIONS:**401 KAR 59:010, New process operations****1. Operating Limitations:**

The particulate filters shall be in place anytime the spray booths are in operation.

2. Emission Limitations:

- a. 401 KAR 59:010, Section 3(1)(a) limits visible emissions from each stack to less than 20% opacity.

Compliance Demonstration Method:

Refer to subsection 4. Specific Monitoring Requirements and subsection 5. Specific Recordkeeping Requirements.

- b. 401 KAR 59:010, Section 3(2) limits emissions of particulate matter from each spray booth to a maximum of 2.34 lbs/hr.

Compliance Demonstration Method:

Refer to subsection 4. Specific Monitoring Requirements and subsection 5. Specific Recordkeeping Requirements.

3. Testing Requirements:

Testing shall be conducted at such times as may be required by the Cabinet in accordance with 401 KAR 59:005, Section 2(2) and 401 KAR 50:045, Section 4.

4. Specific Monitoring Requirements:

- a. Resistance to airflow across the booth filters shall be monitored by use of a magnahelic gauge, manometer or other means, as an indicator of the need for filter maintenance. Readings from the chosen instrument shall be taken at a minimum of once each 8 hours of operation.

SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**MAINTENANCE SPRAY BOOTH****4. Specific Monitoring Requirements (continued):**

- b. Compliance with the opacity standard shall be determined by the permittee performing a qualitative visual observation of the opacity of emissions at each stack during daylight hours no less than weekly and maintaining a log of the observations. If visible emissions from the stacks are seen (not including condensed water in the plume), then an inspection of process/control equipment shall be initiated and corrective action taken. If visible emissions are present after the corrective action, the permittee may determine the opacity using Reference Method 9.

5. Specific Recordkeeping Requirements:

- a. Monthly records should be kept of all coatings, thinners, clean-up solutions used, including the type, amount, VOC content by weight percent, less any water and/or exempt solvent.
- b. Monthly records shall be kept of all materials containing HAP(s) used for the above affected facilities, including the product type, amount used and the weight percentages of all individual HAPs.
- c. The permittee shall maintain records of the weekly visual observations.
- d. The permittee shall maintain a log of the pressure drop readings across the fabric filters, including the time, date, identity of the personnel making the record, and dates of filter replacements. For any booth that is not in operation on a given date, this fact should also be noted.

6. Specific Reporting Requirements:

The permittee shall submit a copy of the control device inspection and repair log for those times when corrective actions are required, either due to an opacity exceedance as noted in Section B.4, paragraph b, or due to problems with the dry filters, noted as required by Section B.5, paragraph c. Copies of these records shall be submitted as a part of the semiannual reporting as required in Section F (5) & (6).

7. Specific Control Equipment Operating Conditions:

The particulate filters should be changed in accordance with manufacturer recommendations.

8. Alternate Operating Scenarios:

None

SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

EMERGENCY ENGINES

EU 65 Diesel Generator – Backup (14.8 gallons/hr)

EU 66 Diesel Fire Pumphouse Engine (14.8 gallons/hr)

Installed: Fire Pump 1985, Emergency Generator February 1985

Power Output: <500 Horsepower each

APPLICABLE REGULATIONS:

401 KAR 63:002 Section 2(4)(eeee), 40 C.F.R. 63.6580 to 63.6675, Tables 1a to 8, and Appendix A (Subpart ZZZZ), National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines.

Delete

~~Note: D.C. Circuit Court [*Delaware v. EPA*, 785 F. 3d 1 (D.C. Cir. 2015)] has vacated the provisions in 40 CFR 63, Subpart ZZZZ that contain the 100-hour exemption for operation of emergency engines for purposes of emergency demand response under 40 CFR 63.6640(f)(2)(ii)-(iii). The D.C. Circuit Court issued the mandate for the vacatur on May 4, 2016.~~

1. Operating Limitations:

- a) Pursuant to 40 CFR 63.6602 and Table 2c:
- (1) Change oil and filter every 500 hours of operation or annually, whichever comes first;
 - (2) Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first;
 - (3) Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary.
 - (4) Minimize the engine's time spent at idle and minimize the engine's startup time at startup to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes, after which time the non-startup emission limitations apply.
- b) 40 CFR 63.6640 (f)(1)(i) There is no time limit on the use of emergency stationary RICE in emergency situations.
- c) 40 CFR 63.6640 (f)(2)(i) You may operate your emergency stationary RICE for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. The owner or operator may petition the Division for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency RICE beyond 100 hours per year.

Add the following additional option noted in Table 2c, Footnote 2:

Alternately, an oil analysis program as described in § 63.6625(i) or (j) may be utilized to extend the specified oil change requirement.

Request the following be added between "vendor," and "or" to match regulatory language:

the regional transmission organization or equivalent balancing authority and transmission operator.

SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**EMERGENCY ENGINES****1. Operating Limitations (continued):**

- d) 40 CFR 63.6640 (f)(3) You may operate your emergency stationary RICE up to 50 hours per year in non-emergency situations, but those 50 hours are counted towards the 100 hours per year provided for maintenance and testing. The 50 hours per year for nonemergency situations cannot be used for peak shaving or to generate income for a facility to supply power to an electric grid or otherwise supply power as part of a financial arrangement with another entity.

2. Emission Limitations:

Refer to 1. Operating Limitations

3. Testing Requirements:

None

4. Specific Monitoring Requirements:

- a) 40 CFR 63.6625 (e) you must operate and maintain the stationary RICE and after-treatment control device (if any) according to the manufacturer's emission related written instructions or develop your own maintenance plan which must provide to the extent practicable for the maintenance and operation of the engine in a manner consistent with good air pollution control practice for minimizing emissions:
- b) 40 CFR 63.6625 (f) you must install a non-resettable hour meter if one is not already installed.

5. Specific Recordkeeping Requirements:

- a) 40 CFR 63.6655 (a) If you must comply with the emission and operating limitations, you must keep the records described in paragraphs (a)(1) through (a)(5), (b)(1) through (b)(3) and (c) of this section.
- (1) 40 CFR 63.6655 (a)(1) A copy of each notification and report that you submitted to comply with this subpart, including all documentation supporting any Initial Notification or Notification of Compliance Status that you submitted, according to the requirement in §63.10(b)(2)(xiv).
- (2) 40 CFR 63.6655 (a)(2) Records of the occurrence and duration of each malfunction of operation (i.e., process equipment) or the air pollution control and monitoring equipment.
- (3) 40 CFR 63.6655 (a)(3) Records of performance tests and performance evaluations as required in §63.10(b)(2)(viii).
- (4) 40 CFR 63.6655 (a)(4) Records of all required maintenance performed on the air pollution control and monitoring equipment.

Request the following language be added since not all requirements may apply to an emergency engine:

as applicable.

SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**EMERGENCY ENGINES****5. Specific Recordkeeping Requirements (continued):**

- (5) 40 CFR 63.6655 (a)(5) Records of actions taken during periods of malfunction to minimize emissions in accordance with 40 CFR 63.6605(b), including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation.
- b) 40 CFR 63.6655 (e) You must keep records of the maintenance conducted on the stationary RICE in order to demonstrate that you operated and maintained the stationary RICE and after-treatment control device (if any) according to your own maintenance plan
- c) 40 CFR 63.6655 (f) You must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The owner or operator must document how many hours are spent for emergency operation, including what classified the operation as emergency and how many hours are spent for non-emergency operation. If the engines are used for demand response operation, the owner or operator must keep records of the notification of the emergency situation, and the time the engine was operated as part of demand response.
- d) 40 CFR 63.6660 (a) Your records must be in a form suitable and readily available for expeditious review according to 40 CFR 63.10(b)(1).
- e) 40 CFR 63.6660 (b) As specified in 40 CFR 63.10(b)(1), you must keep each record for 5 years following the date of each occurrence, measurement, maintenance, corrective action, report, or record.
- f) 40 CFR 63.6660 (c) You must keep each record readily accessible in hard copy or electronic form for at least 5 years after the date of each occurrence, measurement, maintenance, corrective action, report, or record, according to 40 CFR 63.10(b)(1).

6. Specific Reporting Requirements:

If an emergency engine is operating during an emergency and it is not possible to shut down the engine in order to perform the work practice requirements on the schedule required in Table 2c of this subpart, or if performing the work practice on the required schedule would otherwise pose an unacceptable risk under Federal, State, or local law, the work practice can be delayed until the emergency is over or the unacceptable risk under Federal, State, or local law has abated. The work practice should be performed as soon as practicable after the emergency has ended or the unacceptable risk under Federal, State, or local law has abated. Sources must report any failure to perform the work practice on the schedule required and the Federal, State or local law under which the risk was deemed unacceptable.

7. Specific Control Equipment Operating Conditions:

None

Request citation below be added:
40 CFR Part 63 Subpart ZZZZ, Table 2c, Footnote 1

SECTION C - INSIGNIFICANT ACTIVITIES

The following listed activities have been determined to be insignificant activities for this source pursuant to 401 KAR 52:020, Section 6. Although these activities are designated as insignificant the permittee must comply with the applicable regulation. Process and emission control equipment at each insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emissions evaluation made. Results of the inspection, evaluation, and any corrective action shall be recorded in a log.

Description Generally Applicable Regulation

Utilities

- 1. Domestic Hot Water Boiler (0.075 MMBtu/hr) n/a
- 2. Domestic Hot Water Boiler (0.08 MMBtu/hr) n/a
- 3. Domestic Hot Water Boiler (0.12 MMBtu/hr) n/a

Add the following under Utilities, refer to DEP7007DD Insignificant Activities form:
 4. TCI-1322-75-1 Cooling Tower 1
 5. TCI-1322-75-1 Cooling Tower 2
 6. TCI-1322-75-1 Cooling Tower 3
 7. TCI-1322-75-1 Cooling Tower 4
 8. TCI-1322-75-1 Cooling Tower 5
 9. TT T.360.319 Cooling Tower 1
 10. TT T.360.319 Cooling Tower 2

Quality Lab

- 11. 4. Chemical Hood n/a
- 12. 5. Chemical Hood n/a
- 13. 6. Lab Drying Oven 1-3 (1985) n/a
- 14. 7. Lab Drying Oven 4 (10/1996) n/a
- 15. 8. Laboratory Fume Hood 1 n/a
- 16. 9. Laboratory Fume Hood 2 n/a
- 17. 10. Laboratory Fume Hood 3 n/a

Fire Pumphouse

- 18. 11. Diesel Storage Tank n/a
- 19. 12. Fire Protection Water Boiler (0.0016 MMBtu/hr) n/a
- 20. 13. Pumphouse – Gas Space (0.063 MMBtu/hr) n/a
- 21. 14. Pumphouse – Gas Space (0.063 MMBtu/hr) n/a

Tape Maintenance

- 22. 15. Beringer JCP Jet Cleaner n/a
- 23. 16. Safety Kleen Tank 401 KAR 59:185
- 24. 17. Sandblaster w/ filter, enclosed system, 775 cfm 401 KAR 59:010
- 25. 18. Sandblaster w/ filter, enclosed system, 775 cfm 401 KAR 59:010
- 26. 19. Sandblaster w/ filter, enclosed system, 775 cfm 401 KAR 59:010

Miscellaneous

- 20. ~~Baler and Baler Dust Collector~~ ~~401 KAR 59:010~~ Remove. Unit replaced.
- 29. 21. Urethane LAB Storage Tank (6800 Gallons) n/a
- 30. 22. Urethane LAB Storage Tank (6800 Gallons) n/a
- 31. 23. Raildock Dust Collector – Rubber 401 KAR 59:010

Add the following under Miscellaneous, refer to DEP7007DD Insignificant Activities form:
 27. Metal X 3D Printer
 28. Recycle Baler and Dust Collector

Solvent Recovery

- 24. ~~IPA Holding Tank (SRU)~~ n/a
- 32. 25. IPA Reflux Tank (CRU) n/a
- 26. ~~IPA Storage Tank (SRU) (6000 gallons/year)~~ n/a
- 33. 27. ~~IPA/Water Tank~~ n/a

Remove. Units decommissioned.

SECTION C - INSIGNIFICANT ACTIVITIES (CONTINUED)

Description

Generally Applicable Regulation

Storage Tanks

34.	28.	Heptane Storage Tank, Tank T1A 12' dia. x23', white, 19000 gallon, installed 1985	n/a
35.	29.	Heptane Storage Tank, Tank T1B 12' dia. x23', white, 19000 gallon, installed 1985	n/a
36.	30.	Recovered Heptane Tank, Tank RT1 12' dia. x23', white, 19000 gallon, installed 1992	n/a
37.	31.	Recovered Heptane Tank, Tank RT2 12' dia. x23', white, 19000 gallon, installed 1992	n/a
	32.	#2 Fuel Oil Tank, Tank T5A, decommissioned 12' dia. x23', white, 19000 gallon, installed 1985	n/a
38.	33.	#2 Fuel Oil Tank, Tank T5B 12' dia. x23', white, 19000 gallon, installed 1985	n/a

Remove. Units decommissioned.

Other

39.	34.	Safety Kleen Tank, installed 2008	401 KAR 59:185
15-J			
40.	35.	Cumberland Grinder Max continuous rating: 4400 lb/hr, installed 1989	401 KAR 59:010
41.	36.	Gamma Intermediate Silo w/ bag sock filter	401 KAR 59:010
42.	37.	15J Pelletizer	401 KAR 59:010
43.	38.	15J Air Filter	401 KAR 59:010
44.	39.	15J Melt Filter	401 KAR 59:010

Add the following under 15J, refer to DEP7007DD Insignificant Activities form:

- 45. 15J Pellet Dryer, Beringer Air Dryer
- 46. 15J Coextruder 1
- 47. 15J Coextruder 2
- 48. 15J Metering Melt Extruders
- 49. 15J Polypropylene Dust Collector
- 50. 15J High Density Storage Tank Dust Collector

2R Line

Add the following under 2R Line, refer to DEP7007DD Insignificant Activities form:
51. PC2 Station - 2R LAB Holding Tank
52. Functional Coat Station - 2R Adhesive Holding Tank
53. Primer Station - 2R/4R Cleaning Cart (MEK)
54. (PCT1) - 2R/4R Cleaning Tank, 6"W x 65"L
55. 2R IPA Cleaning Solution Drums (located at die cleaning hood)

3R Line

Add the following under 3R Line, refer to DEP7007DD Insignificant Activities form:
56. Flametreater
57. Resin Holding Tank (2,000 gallons)
58. Resin Holding Tank (750 gallons)
59. Supersack Powder Handling (Resin Compounding)
60. Rubber Dust Collector
61. (PCT3) - Two (2) Filter Cleaning Tank and Maintenance Parts Washer, 20.5"W x 42.5" L
62. 3R Bay - IPA Cleaning Solution Drums (55 gallon drums)

4R Line

Add the following under 4R Line, refer to DEP7007DD Insignificant Activities form:
63. PC1 Station - Primer Holding Tank (25 gallons)
64. PC2 Station - LAB Holding Tank
65. Adhesive Cleaning Station (IPA)

Solvent Compounding

Add the following under Solvent Compounding, refer to DEP7007DD Insignificant Activities form:
Room 161 - Compounding Area 1:
66. LAB Mix Tank
67. LAB Solids Tank
Room 162 - Compounding Area 2:
68. Adhesive Mix Tank #2
69. Adhesive Storage Tank (5000 gallons)
70. Heptane Surge Tank (Solvent)
71. LAB Storage Tank (2000 gallons)
Room 163 - Compounding Area 3:
72. MEK Cleaning Solution (55 gallon drums)
73. Myers Mixer
74. 3R SPU LAB Storage Tank (2300 gallons)
75. 3R SPU LAB Storage Tank (2300 gallons)

Waterbased Compounding

Add the following under Waterbased Compounding, refer to DEP7007DD Insignificant Activities form:

- 76. Cowles Mixer
- 77. Lightning Mixer
- 78. Dyno Mixer

Injection Molding

Add the following under Injection Molding, refer to DEP7007DD Insignificant Activities form:

- 79. A07S Injection Molding 1
- 80. A07S Injection Molding 2
- 81. A13S Injection Molding 1
- 82. A13S Injection Molding 2
- 83. A06S Injection Molding 1
- 84. A06S Injection Molding 2
- 85. A15S Injection Molding 1
- 86. A15S Injection Molding 2

SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS

1. As required by Section 1b of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26; compliance with annual emissions and processing limitations contained in this permit, shall be based on emissions and processing rates for any twelve (12) consecutive months.
2. VOC, HAP, and Particulate Matter emissions, measured by applicable reference methods, or an equivalent or alternative method specified in 40 C.F.R. Chapter I, or by a test method specified in the state implementation plan shall not exceed the respective limitations specified herein.
3. **Source Emission Limitation:**

To preclude applicability of New Source Review (NSR) under 401 KAR 51:017, Prevention of significant deterioration of air quality, source wide emissions of VOCs shall not exceed 249 tons during any consecutive twelve (12) month period.

Compliance Demonstration Method:

- a. By the 30th day following the end of each month the permittee shall sum the mass of VOC emitted across all VOC emission sources of the facility for the preceding month.
- b. Sum the above-calculated VOC emissions with the monthly totals of the eleven (11) previous months.
- c. Record the source wide twelve (12) month VOC emissions total each month and submit this information as part of the semi-annual reporting required by Section F of this permit.
- d. If total VOC emissions during any twelve-month period exceed 225 tons, the permittee will begin tracking annual emissions on a weekly basis beginning the following calendar month. Emissions will be tracked in this manner for a minimum of three (3) consecutive months, and monthly emission reports shall be submitted to the Florence Regional Office during this time. If the rolling twelve-month totals remain less than 225 tons for three (3) consecutive months, the permittee may return to monthly tracking and semi-annual reporting until such time as emissions may again exceed 225 tons for a rolling twelve (12) month total.

Note: weekly tracking will be accomplished by recalculating each of the applicable month's emissions from the prior year from a monthly total to weekly totals, and compared with the weekly totals from the same week of the current year. For the purposes of this tracking, each month shall be broken down into four (4) weeks as follows:

Week 1. Day 1 thru day 7
Week 2. Day 8 thru day 14
Week 3. Day 15 thru day 21
Week 4. Day 22 thru day 31

Weekly emissions shall be calculated by the 7th day following the end of each week.

SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS (CONTINUED)**4. Testing Materials for VOC, HAP, and Solids Content:**

The permittee shall use the following methods for determination of VOC, HAP, and Solids content of coating materials for all compliance demonstration methods.

a. *Volatile Organic and Coating Solids Content*, 40 CFR 63.3360(d).

- (1) *Method 24*. The permittee may determine the volatile organic and coating solids mass fraction of each coating applied using Method 24 (40 CFR part 60, appendix A.) The Method 24 determination may be performed by the manufacturer of the material and the results provided.
- (2) *Formulation data*. The permittee may determine the volatile organic content and coating solids content of a coating material based on formulation data and may rely on volatile organic content data provided by the manufacturer of the material. In the event of any inconsistency between the formulation data and the results of Method 24 of 40 CFR part 60, appendix A, and the Method 24 results are higher, the results of Method 24 will govern.

b. *Organic HAP Content*, 40 CFR 63.3360(c).

- (1) *Method 311*. The permittee may test the coating material in accordance with Method 311 of appendix A of 40 CFR Part 63. The Method 311 determination may be performed by the manufacturer of the coating material and the results provided to the owner or operator. The organic HAP content must be calculated according to the criteria and procedures in paragraphs (c)(1)(i) through (iii) of 40 CFR 63.3360; (refer to referenced section for details)
- (2) *Method 24*. Determine the volatile organic content as mass fraction of nonaqueous volatile matter and use it as a substitute for organic HAP using Method 24 of 40 CFR part 60, appendix A. The Method 24 determination may be performed by the manufacturer of the coating, 40 CFR 63.3360(c)(2).
- (3) *Formulation data*. The permittee may use formulation data to determine the organic HAP mass fraction of a coating material. Formulation data may be provided to the owner or operator by the manufacturer of the material. In the event of an inconsistency between Method 311 (appendix A of 40 CFR part 63) test data and a facility's formulation data, and the Method 311 test value is higher, the Method 311 data will govern. Formulation data may be used provided that the information represents all organic HAP present at a level equal to or greater than 0.1 percent for OSHA defined carcinogens as specified in 29 CFR 1910.1200(d)(4) and equal to or greater than 1.0 percent for other organic HAP compounds in any raw material used, 40 CFR 63.3360(c)(3).

Add the following language onto (b) (2):

One of the voluntary consensus standards in paragraphs (c)(2)(i) through (v) of 40 CFR 63.3360 may be used as an alternative to using Method 24.

c. *Alternative Test Methods for Coating Materials*, 40 CFR 63.3420(b).

Pursuant to 40 CFR part 63, subpart JJJJ, authority to approve alternative test methods for organic HAP content determination, 40 CFR 63.3360(c); and for volatile matter determination, 40 CFR 63.3360(d) remains with the U.S. EPA.

SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS (CONTINUED)

- d. *Volatile matter retained in the coated web or otherwise not emitted to the atmosphere, 40 CFR 63.3360(g).*

The permittee may choose to take into account the mass of volatile matter retained in the coated web after curing or drying or otherwise not emitted to the atmosphere when determining compliance with the emission standards. To use this option, the permittee must ~~develop a testing protocol to determine the mass of volatile matter (and/or HAP) retained in the coated web or otherwise not emitted to the atmosphere and submit this protocol to the Division for approval.~~

5. **VOC and HAP Applied:**

The equations and procedures referenced in Attachment B can be used to determine the VOC and HAP input to an individual applicator / work station, a group of applicators / work stations which are part of a coating line, or to an entire coating line as a single group. The VOC or HAP emitted from an uncontrolled applicator / work station is equal to the VOC or HAP applied on that applicator / work station minus the mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere.

6. **Compliant Coatings:**

The equations and procedures referenced in Attachment B can be used for each coating line, portion of a coating line, or an individual applicator / work station which uses low VOC and HAP containing materials.

7. **Use of Capture and Control with Always-Controlled Work Stations:**

The equations and procedures referenced in Attachment B can be used for each coating line, portion of a coating line, or an individual applicator / work station which utilizes capture and control throughout the month.

8. **Use of Capture and Control with One or More Never-Controlled or Intermittently-Controlled Work Stations:**

The procedures and equations referenced in Attachment B can be used for each coating line or portion of a coating line in which some of the applicators / work stations use capture and control throughout the month, and other applicators / work stations within the group are uncontrolled throughout the month or intermittently controlled.

9. **401 KAR 51:017, Section 16(1), Source Obligation:**

The permittee shall operate the affected facilities in accordance with the application submitted to the Cabinet under this administrative regulation.

Replace redlined language with the following:

develop a site- and product-specific emission factor (EF) and determine the amount of volatile matter retained in the coated web or otherwise not emitted using Equation 3 to § 63.3360(g)(1). The EF must be developed by conducting a performance test using an approved EPA test method, or alternative approved by the Administrator by obtaining the average of a three-run test. You may additionally use manufacturer's emissions test data (as long as it replicates the facility's coating formulation and operating conditions), or a mass-balance type approach using a modified Method 24 (including ASTM D5403-93 for radiation-curable coatings). The EF should equal the proportion of the mass of volatile organics emitted to the mass of volatile organics in the coating materials evaluated. You may use the EF in your compliance calculations only for periods that the work station(s) was (were) used to make the product, or a similar product, corresponding to that produced during the performance test. You must develop a separate EF for each group of different products that you choose to utilize an EF for calculating emissions by conducting a separate performance test for that group of products. You must conduct a periodic performance test to re-establish the EF if there is a change in coating formulation, operating conditions, or other change that could reasonably be expected to increase emissions since the time of the last test that was used to establish the EF.

SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS

1. Pursuant to 401 KAR 50:055, Section 2(5), at all times, including periods of startup, shutdown and malfunction, owners and operators shall, to the extent practicable, maintain and operate any affected facility including associated air pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Division which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.
2. **40 CFR Part 63, Subpart JJJJ**
 - (1) For thermal oxidizers and capture systems which are not permanent total enclosures, the permittee must:
 - (i) Demonstrate initial compliance for each capture system and each control device through performance tests;
 - (ii) Establish the operating limits for each capture system and control device during the performance testing; and,
 - (iii) Meet the operating limits at all times after establishing them.
 - (2) For capture systems which are permanent total enclosures, the permittee shall:
 - (i) Demonstrate that a total enclosure is installed;
 - (ii) Monitor the capture system operating parameters at all times web coating is being performed.
 - (3) For the solvent recovery systems, operate continuous emission monitoring systems and perform quarterly audits, 40 CFR 63.3350(d).
 - (4) At all times, the permittee must maintain the monitoring systems in proper working order including, but not limited to, maintaining necessary parts for routine repairs of the monitoring equipment, 40 CFR 63.3350(e)(~~6~~).

Add the following per 40 CFR 63.3330(a)(2):

(iv) Perform a periodic emissions performance test by July 9, 2023, or within 60 months of the previous test, whichever is later, and subsequent tests no later than 60 months thereafter, as required in §63.3360.

Update to 63.3350(e)(7)

Compliance Demonstration Method:

The permittee shall keep records of control operations associated with Line 3R. Also, See testing requirements below.

3. Continuous Parameter Monitoring Systems (CPMS)**a. Thermal Oxidizers**

- (1) The permittee shall install, calibrate, maintain, and operate a monitoring device which continuously indicates and records the temperature of the solvent destruction device's exhaust gases. The monitoring device shall have an accuracy of the greater of ± 0.75 percent of the temperature being measured expressed in degrees Celsius or ± 2.5 °C, 40 CFR 60.445(e).
- (2) The thermocouple or temperature sensor must be installed in the combustion chamber at a location in the combustion zone, 40 CFR 63.3350(e)(~~9~~)(ii).

Update to 63.3350(e)(10)(ii)

SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS (CONTINUED)

- (3) ~~The calibration of the chart recorder, data logger, or temperature indicator must be verified every 3 months and after every deviation or the chart recorder, data logger, or temperature indicator must be replaced. If the equipment cannot be calibrated properly it must be replaced, 40 CFR 63.3350(e)(9)(i). Calibration methods include comparisons of sensor output to redundant temperature sensors, to calibrated temperature measurement devices, or to temperature simulation devices.~~
- (4) Before using the sensor for the first time or when relocating or replacing the sensor, perform a validation check by comparing the sensor output to a calibrated temperature measurement device or by comparing the sensor output to a simulated temperature.
- (5) Conduct a visual inspection of each sensor every quarter if redundant temperature sensors are not used.

b. Capture System Monitoring

- (1) For any affected facility utilizing a control device, which uses a hood or enclosure to capture fugitive VOC emissions, the permittee shall install, calibrate, maintain, and operate a monitoring device which continuously indicates that the hood or enclosure is operating, 40 CFR 60.445(g).
- (2) In all cases the design of any control system shall be subject to approval by the Cabinet, 401 KAR 59:210, Section 4(1).
- (i) **Capture Efficiency Monitoring with Flow Measurements**
Each flow measurement device must meet the following requirements:
- Locate a flow sensor in a position that provides a representative flow measurement in the duct from each capture device in the emission capture system to the add-on control device.
 - Use a flow sensor with an accuracy of at least 10 percent of the flow.
 - Perform an initial sensor calibration in accordance with the manufacturer's requirements

Replace redline with the following language (See 63.3350(e)(5) and 63.3350(e)(10)):

(3)(A) Except for temperature sensors, you must develop a quality control program that must contain, at a minimum, a written protocol that describes the procedures for each of the operations in § 63.3350(e)(5)(i) through (vi). The owner or operator shall keep these written procedures on record for the life of the affected source or until the affected source is no longer subject to the provisions of this part, to be made available for inspection, upon request, by the Administrator. If the performance evaluation plan is revised, the owner or operator shall keep previous (i.e., superseded) versions of the performance evaluation plan on record to be made available for inspection, upon request, by the Administrator, for a period of 5 years after each revision to the plan. For temperature sensors, you must follow the requirements in §63.3350(e)(10).

- Initial and any subsequent calibration of the continuous monitoring system (CMS);
- Determination and adjustment of the calibration drift of the CMS;
- Preventative maintenance of the CMS, including spare parts inventory;
- Data recording, calculations, and reporting;
- Accuracy audit procedures, including sampling and analysis methods; and
- Program of corrective action for a malfunctioning CMS.

(3)(B) For temperature sensors, you must develop a quality control program that must contain, at a minimum, a written protocol that describes the procedures for verifying that the temperature sensor is operating properly using at least one of the methods in paragraph (e)(10)(iv)(A), (B), (C), (D), (E), or (F) of this section. The owner or operator shall keep these written procedures on record for the life of the affected source or until the affected source is no longer subject to the provisions of this part, to be made available for inspection, upon request, by the Administrator:

- Semiannually, compare measured readings to a National Institute of Standards and Technology (NIST) traceable temperature measurement device or simulate a typical operating temperature using a NIST traceable temperature simulation device. When the temperature measurement device method is used, the sensor of the calibrated device must be placed as close as practicable to the process sensor, and both devices must be subjected to the same environmental conditions. The accuracy of the temperature measured must be 2.5 percent of the temperature measured by the NIST traceable device or 5 degrees Fahrenheit whichever is greater.
- Annually validate the temperature sensor by following applicable mechanical and electrical validation procedures in the manufacturer owner's manual.
- Annually request the temperature sensor manufacturer to certify or re-certify electromotive force (electrical properties) of the thermocouple.
- Annually replace the temperature sensor with a new certified temperature sensor in lieu of validation.
- Permanently install a redundant temperature sensor as close as practicable to the process temperature sensor. The sensors must yield a reading within 2.5 percent of each other for thermal oxidizers and catalytic oxidizers.
- Permanently install a temperature sensor with dual sensors to account for the possibility of failure.

the initial use or upon relocation or on checks include comparison of signal simulations or via relative

quarter and after every deviation. comparisons of sensor values with relative accuracy testing.

sensor system quarterly if there is no

Pressure Drop Measurements
device must meet the following

as close as possible to a position
measurement of the pressure drop across

**SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS
(CONTINUED)**

- b) Use a pressure sensor with an accuracy of at least 0.5 inches of water column or 5 percent of the measured value, whichever is larger.
 - c) Perform an initial calibration of the sensor according to the manufacturer's requirements.
 - d) Conduct a validation check before initial operation or upon relocation or replacement of a sensor. Validation checks include comparison of sensor values to calibrated pressure measurement devices or to pressure simulation using calibrated pressure sources.
 - e) Conduct accuracy audits every quarter and after every deviation. Accuracy audits include comparison of sensor values to calibrated pressure measurement devices or to pressure simulation using calibrated pressure sources.
- c. Capture System Monitoring Plan, 40 CFR 63.3350(f)
- (1) The permittee shall develop a site-specific monitoring plan for the capture systems.
The monitoring plan must:
 - (i) Identify the operating parameter to be monitored to ensure that the capture efficiency determined during the initial compliance test is maintained; and
 - (ii) Explain why this parameter is appropriate for demonstrating ongoing compliance; and
 - (iii) Identify the specific monitoring procedures.
 - (2) The monitoring plan must specify the operating parameter value or range of values that demonstrate compliance with the emission standards in § 63.3320. The specified operating parameter value or range of values must represent the conditions present when the capture system is being properly operated and maintained.
 - (3) The permittee must conduct all capture system monitoring in accordance with the plan.
 - (4) The permittee shall make the monitoring plan available for inspection by the permitting authority upon request.
 - (5) Any deviation from the operating parameter value or range of values which are monitored according to the plan will be considered a deviation from the operating limit.
 - (6) The permittee shall review and update the capture system monitoring plan at least annually.

4. Continuous Emission Monitoring System (CEMS)**a. Solvent Recovery Units**

- (1) The permittee must install, calibrate, operate, and maintain the CEMS according to paragraphs (d)(1)(i) through (iii) of 40 CFR 63.3350.
 - (i) Measure the total organic volatile matter mass flow rate at both the control device inlet and the outlet such that the reduction efficiency can be determined. Each continuous emission monitor must comply with performance specification 6, 8, or 9 of 40 CFR Part 60, appendix B, as appropriate.

**SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS
(CONTINUED)**

- (ii) The permittee must follow the quality assurance procedures in procedure 1, appendix F of 40 CFR Part 60. In conducting the quarterly audits of the monitors as required by procedure 1, appendix F, you must use compounds representative of the gaseous emission stream being controlled.
- (iii) The permittee must have valid data from at least 90 percent of the hours during which the process is operated.

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS

1. Pursuant to Section 1b-IV-1 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26, when continuing compliance is demonstrated by periodic testing or instrumental monitoring, the permittee shall compile records of required monitoring information that include:
 - a. Date, place as defined in this permit, and time of sampling or measurements;
 - b. Analyses performance dates;
 - c. Company or entity that performed analyses;
 - d. Analytical techniques or methods used;
 - e. Analyses results; and
 - f. Operating conditions during time of sampling or measurement.
2. Records of all required monitoring data and support information, including calibrations, maintenance records, and original strip chart recordings, and copies of all reports required by the Division for Air Quality, shall be retained by the permittee for a period of five (5) years and shall be made available for inspection upon request by any duly authorized representative of the Division for Air Quality [Sections 1b-IV-2 and 1a-8 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
3. In accordance with the requirements of 401 KAR 52:020, Section 3(1)h, the permittee shall allow authorized representatives of the Cabinet to perform the following during reasonable times:
 - a. Enter upon the premises to inspect any facility, equipment (including air pollution control equipment), practice, or operation;
 - b. To access and copy any records required by the permit;
 - c. Sample or monitor, at reasonable times, substances or parameters to assure compliance with the permit or any applicable requirements.Reasonable times are defined as during all hours of operation, during normal office hours; or during an emergency.
4. No person shall obstruct, hamper, or interfere with any Cabinet employee or authorized representative while in the process of carrying out official duties. Refusal of entry or access may constitute grounds for permit revocation and assessment of civil penalties.
5. Summary reports of any monitoring required by this permit shall be submitted to the Regional Office listed on the front of this permit at least every six (6) months during the life of this permit, unless otherwise stated in this permit. For emission units that were still under construction or which had not commenced operation at the end of the 6-month period covered by the report and are subject to monitoring requirements in this permit, the report shall indicate that no monitoring was performed during the previous six months because the emission unit was not in operation [Sections 1b-V-1 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS (CONTINUED)

6. The semi-annual reports are due by January 30th and July 30th of each year. All reports shall be certified by a responsible official pursuant to 401 KAR 52:020, Section 23. If continuous emission and opacity monitors are required by regulation or this permit, data shall be reported in accordance with the requirements of 401 KAR 59:005, General Provisions, Section 3(3). All deviations from permit requirements shall be clearly identified in the reports.
7. In accordance with the provisions of 401 KAR 50:055, Section 1, the owner or operator shall notify the Regional Office listed on the front of this permit concerning startups, shutdowns, or malfunctions as follows:
 - a. When emissions during any planned shutdowns and ensuing startups will exceed the standards, notification shall be made no later than three (3) days before the planned shutdown, or immediately following the decision to shut down, if the shutdown is due to events which could not have been foreseen three (3) days before the shutdown.
 - b. When emissions due to malfunctions, unplanned shutdowns and ensuing startups are or may be in excess of the standards, notification shall be made as promptly as possible by telephone (or other electronic media) and shall be submitted in writing upon request.
8. The permittee shall promptly report deviations from permit requirements, including those attributable to upset conditions as defined in the permit, the probable cause of such deviations, and any corrective actions or preventive measures taken shall be submitted to the Regional Office listed on the front of this permit. Where the underlying applicable requirement contains a definition of prompt or otherwise specifies a time frame for reporting deviations, that definition or time frame shall govern. Where the underlying applicable requirement does not identify a specific time frame for reporting deviations, prompt reporting, as required by Sections 1b-V, 3 and 4 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26, shall be defined as follows:
 - a. For emissions of a hazardous air pollutant or a toxic air pollutant (as identified in an applicable regulation) that continue for more than an hour in excess of permit requirements, the report must be made within 24 hours of the occurrence.
 - b. For emissions of any regulated air pollutant, excluding those listed in F.8.a., that continue for more than two hours in excess of permit requirements, the report must be made within 48 hours.
 - c. All deviations from permit requirements, including those previously reported, shall be included in the semiannual report required by F.6.
9. Pursuant to 401 KAR 52:020, Title V permits, Section 21, the permittee shall annually certify compliance with the terms and conditions contained in this permit, by completing and returning a Compliance Certification Form (DEP 7007CC) (or an alternative approved by the regional office) to the Regional Office listed on the front of this permit and the U.S. EPA in accordance with the following requirements:
 - a. Identification of the term or condition;
 - b. Compliance status of each term or condition of the permit;
 - c. Whether compliance was continuous or intermittent;
 - d. The method used for determining the compliance status for the source, currently and over the reporting period.

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS (CONTINUED)

- e. For an emissions unit that was still under construction or which has not commenced operation at the end of the 12-month period covered by the annual compliance certification, the permittee shall indicate that the unit is under construction and that compliance with any applicable requirements will be demonstrated within the timeframes specified in the permit.
- f. The certification shall be submitted by January 30th of each year. Annual compliance certifications shall be sent to the following addresses:

Division for Air Quality
Florence Regional Office
8020 Veterans Memorial Drive
Suite 110
Florence, KY 41042

U.S. EPA Region 4
Air Enforcement Branch
Atlanta Federal Center
61 Forsyth St. SW
Atlanta, GA 30303-8960

- 10. In accordance with 401 KAR 52:020, Section 22, the permittee shall provide the Division with all information necessary to determine its subject emissions within 30 days of the date the Kentucky Emissions Inventory System (KYEIS) emissions survey is mailed to the permittee.

SECTION G - GENERAL PROVISIONS1. General Compliance Requirements

- a. The permittee shall comply with all conditions of this permit. Noncompliance shall be a violation of 401 KAR 52:020, Section 3(1)(b), and a violation of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act). Noncompliance with this permit is grounds for enforcement action including but not limited to termination, revocation and reissuance, revision or denial of a permit [Section 1a-3 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- b. The filing of a request by the permittee for any permit revision, revocation, reissuance, or termination, or of a notification of a planned change or anticipated noncompliance, shall not stay any permit condition [Section 1a-6 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- c. This permit may be revised, revoked, reopened and reissued, or terminated for cause in accordance with 401 KAR 52:020, Section 19. The permit will be reopened for cause and revised accordingly under the following circumstances:
 - (1) If additional applicable requirements become applicable to the source and the remaining permit term is three (3) years or longer. In this case, the reopening shall be completed no later than eighteen (18) months after promulgation of the applicable requirement. A reopening shall not be required if compliance with the applicable requirement is not required until after the date on which the permit is due to expire, unless this permit or any of its terms and conditions have been extended pursuant to 401 KAR 52:020, Section 12;
 - (2) The Cabinet or the United States Environmental Protection Agency (U. S. EPA) determines that the permit must be revised or revoked to assure compliance with the applicable requirements;
 - (3) The Cabinet or the U. S. EPA determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit;
 - (4) New requirements become applicable to a source subject to the Acid Rain Program.

Proceedings to reopen and reissue a permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of the permit for which cause to reopen exists. Reopenings shall be made as expeditiously as practicable. Reopenings shall not be initiated before a notice of intent to reopen is provided to the source by the Division, at least thirty (30) days in advance of the date the permit is to be reopened, except that the Division may provide a shorter time period in the case of an emergency.

- d. The permittee shall furnish information upon request of the Cabinet to determine if cause exists for modifying, revoking and reissuing, or terminating the permit; or to determine compliance with the conditions of this permit [Sections 1a- 7 and 8 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- e. Emission units described in this permit shall demonstrate compliance with applicable requirements if requested by the Division [401 KAR 52:020, Section 3(1)(c)].

SECTION G - GENERAL PROVISIONS (CONTINUED)

- f. The permittee, upon becoming aware that any relevant facts were omitted or incorrect information was submitted in the permit application, shall promptly submit such supplementary facts or corrected information to the permitting authority [401 KAR 52:020, Section 7(1)].
- g. Any condition or portion of this permit which becomes suspended or is ruled invalid as a result of any legal or other action shall not invalidate any other portion or condition of this permit [Section 1a-14 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- h. The permittee shall not use as a defense in an enforcement action the contention that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance [Section 1a-4 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- i. All emission limitations and standards contained in this permit shall be enforceable as a practical matter. All emission limitations and standards contained in this permit are enforceable by the U.S. EPA and citizens except for those specifically identified in this permit as state-origin requirements. [Section 1a-15 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- j. This permit shall be subject to suspension if the permittee fails to pay all emissions fees within 90 days after the date of notice as specified in 401 KAR 50:038, Section 3(6) [Section 1a-10 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- k. Nothing in this permit shall alter or affect the liability of the permittee for any violation of applicable requirements prior to or at the time of permit issuance [401 KAR 52:020, Section 11(3) 2.].
- l. This permit does not convey property rights or exclusive privileges [Section 1a-9 of the *Cabinet Provisions and Procedures for Issuing Title V Permits* incorporated by reference in 401 KAR 52:020, Section 26].
- m. Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by the Cabinet or any other federal, state, or local agency.
- n. Nothing in this permit shall alter or affect the authority of U.S. EPA to obtain information pursuant to Federal Statute 42 USC 7414, Inspections, monitoring, and entry [401 KAR 52:020, Section 11(3) 4.].
- o. Nothing in this permit shall alter or affect the authority of U.S. EPA to impose emergency orders pursuant to Federal Statute 42 USC 7603, Emergency orders [401 KAR 52:020, Section 11(3) 1.].

SECTION G - GENERAL PROVISIONS (CONTINUED)

- p. This permit consolidates the authority of any previously issued PSD, NSR, or Synthetic Minor source preconstruction permit terms and conditions for various emission units and incorporates all requirements of those existing permits into one single permit for this source.
- q. Pursuant to 401 KAR 52:020, Section 11, a permit shield shall not protect the owner or operator from enforcement actions for violating an applicable requirement prior to or at the time of permit issuance. Compliance with the conditions of this permit shall be considered compliance with:
 - (1) Applicable requirements that are included and specifically identified in this permit; and
 - (2) Non-applicable requirements expressly identified in this permit.

2. Permit Expiration and Reapplication Requirements

- a. This permit shall remain in effect for a fixed term of five (5) years following the original date of issue. Permit expiration shall terminate the source's right to operate unless a timely and complete renewal application has been submitted to the Division at least six (6) months prior to the expiration date of the permit. Upon a timely and complete submittal, the authorization to operate within the terms and conditions of this permit, including any permit shield, shall remain in effect beyond the expiration date, until the renewal permit is issued or denied by the Division [401 KAR 52:020, Section 12].
- b. The authority to operate granted shall cease to apply if the source fails to submit additional information requested by the Division after the completeness determination has been made on any application, by whatever deadline the Division sets [401 KAR 52:020, Section 8(2)].

3. Permit Revisions

- a. A minor permit revision procedure may be used for permit revisions involving the use of economic incentive, marketable permit, emission trading, and other similar approaches, to the extent that these minor permit revision procedures are explicitly provided for in the State Implementation Plan (SIP) or in applicable requirements and meet the relevant requirements of 401 KAR 52:020, Section 14(2).
- b. This permit is not transferable by the permittee. Future owners and operators shall obtain a new permit from the Division for Air Quality. The new permit may be processed as an administrative amendment if no other change in this permit is necessary, and provided that a written agreement containing a specific date for transfer of permit responsibility coverage and liability between the current and new permittee has been submitted to the permitting authority within ten (10) days following the transfer.

4. Construction, Start-Up, and Initial Compliance Demonstration Requirements

No construction authorized by this permit (V-18-009).

SECTION G - GENERAL PROVISIONS (CONTINUED)5. Testing Requirements

- a. Pursuant to 401 KAR 50:045, Section 2, a source required to conduct a performance test shall submit a completed Compliance Test Protocol form, DEP form 6028, or a test protocol a source has developed for submission to other regulatory agencies, in a format approved by the cabinet, to the Division's Frankfort Central Office a minimum of sixty (60) days prior to the scheduled test date. Pursuant to 401 KAR 50:045, Section 7, the Division shall be notified of the actual test date at least thirty (30) days prior to the test.
- b. Pursuant to 401 KAR 50:045, Section 5, in order to demonstrate that a source is capable of complying with a standard at all times, any required performance test shall be conducted under normal conditions that are representative of the source's operations and create the highest rate of emissions. If [When] the maximum production rate represents a source's highest emissions rate and a performance test is conducted at less than the maximum production rate, a source shall be limited to a production rate of no greater than 110 percent of the average production rate during the performance tests. If and when the facility is capable of operation at the rate specified in the application, the source may retest to demonstrate compliance at the new production rate. The Division for Air Quality may waive these requirements on a case-by-case basis if the source demonstrates to the Division's satisfaction that the source is in compliance with all applicable requirements.
- c. Results of performance test(s) required by the permit shall be submitted to the Division by the source or its representative within forty-five days or sooner if required by an applicable standard, after the completion of the fieldwork.

6. Acid Rain Program Requirements

- a. If an applicable requirement of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act) is more stringent than an applicable requirement promulgated pursuant to Federal Statute 42 USC 7651 through 7651o (Title IV of the Act), both provisions shall apply, and both shall be state and federally enforceable.
- b. The permittee shall comply with all applicable requirements and conditions of the Acid Rain Permit and the Phase II permit application (including the Phase II NOx compliance plan and averaging plan, if applicable) incorporated into the Title V permit issued for this source. The source shall also comply with all requirements of any revised or future acid rain permit(s) issued to this source.

7. Emergency Provisions

- a. Pursuant to 401 KAR 52:020, Section 24(1), an emergency shall constitute an affirmative defense to an action brought for the noncompliance with the technology-based emission limitations if the permittee demonstrates through properly signed contemporaneous operating logs or relevant evidence that:
 - (1) An emergency occurred and the permittee can identify the cause of the emergency;

SECTION G - GENERAL PROVISIONS (CONTINUED)

- (2) The permitted facility was at the time being properly operated;
- (3) During an emergency, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements in the permit; and
- (4) Pursuant to 401 KAR 52:020, 401 KAR 50:055, and KRS 224.01-400, the permittee notified the Division as promptly as possible and submitted written notice of the emergency to the Division when emission limitations were exceeded due to an emergency. The notice shall include a description of the emergency, steps taken to mitigate emissions, and corrective actions taken.
- (5) This requirement does not relieve the source of other local, state or federal notification requirements.

- b. Emergency conditions listed in General Condition G.7.a above are in addition to any emergency or upset provision(s) contained in an applicable requirement [401 KAR 52:020, Section 24(3)].
- c. In an enforcement proceeding, the permittee seeking to establish the occurrence of an emergency shall have the burden of proof [401 KAR 52:020, Section 24(2)].

8. Ozone Depleting Substances

- a. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B:
 - (1) Persons opening appliances for maintenance, service, repair, or disposal shall comply with the required practices contained in 40 CFR 82.156.
 - (2) Equipment used during the maintenance, service, repair, or disposal of appliances shall comply with the standards for recycling and recovery equipment contained in 40 CFR 82.158.
 - (3) Persons performing maintenance, service, repair, or disposal of appliances shall be certified by an approved technician certification program pursuant to 40 CFR 82.161.
 - (4) Persons disposing of small appliances, MVACs, and MVAC-like appliances (as defined at 40 CFR 82.152) shall comply with the recordkeeping requirements pursuant to 40 CFR 82.166
 - (5) Persons owning commercial or industrial process refrigeration equipment shall comply with the leak repair requirements pursuant to 40 CFR 82.156.
 - (6) Owners/operators of appliances normally containing 50 or more pounds of refrigerant shall keep records of refrigerant purchased and added to such appliances pursuant to 40 CFR 82.166.
- b. If the permittee performs service on motor (fleet) vehicle air conditioners containing ozone-depleting substances, the source shall comply with all applicable requirements as specified in 40 CFR 82, Subpart B, *Servicing of Motor Vehicle Air Conditioners*.

SECTION G - GENERAL PROVISIONS (CONTINUED)

9. Risk Management Provisions

- a. The permittee shall comply with all applicable requirements of 401 KAR Chapter 68, Chemical Accident Prevention, which incorporates by reference 40 CFR Part 68, Risk Management Plan provisions. If required, the permittee shall comply with the Risk Management Program and submit a Risk Management Plan to:

RMP Reporting Center
P.O. Box 10162
Fairfax, VA 22038

- b. If requested, submit additional relevant information to the Division or the U.S. EPA.

SECTION H - ALTERNATE OPERATING SCENARIOS

None

SECTION I - COMPLIANCE SCHEDULE

None

ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW

This Section, advance minor NSR, is to facilitate permit flexibility and to allow the public and the U.S. EPA the opportunity to review and comment on potential future projects that may not require a permit revision and/or public and U.S. EPA review. This section was developed in consistent with U.S. EPA guidance and the Flexible Air Permitting Rule incorporated in 40 CFR Parts 70. The projects listed below are those reasonably anticipated changes proposed by the permittee.

1. The Division has made a case-by-case preconstruction review of the potential modifications and determined that the following changes can be made pursuant to 401 KAR 52:020 Section 18, Section 502(b)(10) Changes. This determination does not preclude the permittee's ability to pursue any of the following changes by means of any other applicable state approval processes.

All projects considered in this preconstruction review;

- a. Are not modifications under Title I of the Act;
 - (1) 3M Cynthiana shall continue to meet the source wide cap on VOC emissions of 249 tons per year as given in Section D of this permit.
 - (2) Terms and conditions consistent to 401 KAR 51:017 listed in Section B of this permit continue to apply following each change reviewed under this Section.
- b. Are not subject to the Acid Rain Program;
- c. Shall be limited to the modification of an existing affected source under 40 CFR 63 Subpart JJJJ. Reconstruction of the 40 CFR 63 Subpart JJJJ affected source as defined by 40 CFR 63.2 is not authorized by this permit.
- d. Shall not constitute a large pollutant-specific emissions unit as defined by 40 CFR Part 64 that requires the submission of a compliance assurance monitoring plan with the initial application.
- e. This preconstruction review does not relieve the permittee from any new applicable requirements, State or Federal which may become applicable.

401 KAR 52:020, Section 18, Section 502(b)(10) Changes

1. Modify any of the existing web coating lines ~~1R~~, 2R, 3R, 4R, 5R, and/or 6R. Modifications may include, but not be limited to, one or more of the following changes.

Remove 1R. The line has been decommissioned.
- a. Installation of one or more additional coating applicators to the ~~1R~~, 2R, 3R, 4R, 5R, and/or 6R lines subject to 401 KAR 59:210, 401 KAR 59:212, 40 CFR 63, Subpart JJJJ, and 40 CFR 60, Subpart RR as applicable.
 - (1) Terms and conditions consistent to 401 KAR 51:017 continue to apply.
 - (2) Compliance with the applicable regulations and emission limits shall be demonstrated in accordance with Section B of this permit.

**ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW
(CONTINUED)**

Replace redline language with the following from 63.3300 (i):
applicable. Any web coating line subject to this part that is modified to include printing activities, may continue to demonstrate compliance with this part, in lieu of demonstrating compliance with subpart KK of this part. Any web coating line with product and packaging rotogravure print station(s) and/ or a wide-web flexographic print station(s) that is subject to this subpart may elect to continue demonstrating compliance with this subpart in lieu of subpart KK of this part, if the mass of the materials applied to the line's print station(s) in a month ever exceed 5 percent of the total mass of materials applied onto the line during the same period.

- (i) Each coating line shall also continue to be subject to the monitoring, recordkeeping, and reporting requirements in Section B, F and G of this permit.
- (ii) The permittee shall use VOC as a surrogate for HAP in all coating materials when demonstrating compliance with 40 CFR 63, Subpart JJJJ. The permittee is not required to ~~demonstration~~ demonstrate compliance independently with 40 CFR 60, Subpart RR, when VOC is used as a surrogate for HAP, and compliance has been demonstrated for 40 CFR 63, Subpart JJJJ.
- (3) Any additional VOC emissions associated with the installation and operation of one or more coating applicators shall count towards the source wide emission limits in Section D of this permit.

demonstrate

b. Installation of one or more flexographic printers to the 5R and 6R lines which are subject to 401 KAR 59:212, 40 CFR 63, Subpart JJJJ, and 40 CFR 60, Subpart RR as ~~applicable,~~ as long as ~~the total mass of materials used on the all the designated printing stations in each line is less than 5% of the total mass of material used on the coating line to preclude applicability of 40 CFR 63, Subpart KK.~~

- (1) Terms and conditions consistent to 401 KAR 51:017 continue to apply.
- (2) Compliance with the applicable regulations shall be demonstrated in accordance with Section B of this permit.
 - (i) Each coating line shall also continue to be subject to the specific monitoring, recordkeeping, and reporting requirements in Section B, F and G of this permit.
 - (ii) The permittee shall use VOC as a surrogate for HAP in all coating materials when demonstrating compliance with 40 CFR 63, Subpart JJJJ. The permittee is not required to ~~demonstration~~ demonstrate compliance independently with 40 CFR 60, Subpart RR, when VOC is used as a surrogate for HAP, and compliance has been demonstrated for 40 CFR 63, Subpart JJJJ.

demonstrate

Request redline language be replaced with the following:
If the proposed project meets all the criteria of paragraph b under this heading except the total mass of materials used on all designated printing stations, existing and proposed, exceeds 5% of the total mass of material used on a given line the permittee may elect to continue demonstrating compliance with Subpart JJJJ or shall submit for a minor permit revision under 401 KAR 52:020, Section 14, along with copies of the initial notification for 40 CFR 63, Subpart KK as required by 40 CFR 63.9 to both the Division and the U.S. EPA Region 4.

- (3) Any additional VOC emissions associated with the installation and operation of one or more flexographic printers shall count towards the source wide emission limits in Section D of this permit.
- (4) ~~If the proposed project meets all the criteria of paragraph b under this heading except the total mass of materials used on all designated printing stations, existing and proposed, exceeds 5% of the total mass of material used on a given line the permittee shall submit for a minor permit revision under 401 KAR 52:020, Section 14, along with copies of the initial notification for 40 CFR 63, Subpart KK as required by 40 CFR 63.9 to both the Division and the U.S. EPA Region 4.~~

c. Installation of one or more drying or curing ovens, utilizing only natural gas or propane for combustion. Alternatively, heat for drying may otherwise be provided by electricity or steam from an existing indirect heat exchanger or boiler.

- (1) Any new combustion source may not contain any type of heat exchanger subject to 401 KAR 59:015, 40 CFR Part 60, Subpart Dc, or 40 CFR Part 63, Subpart DDDDD.

ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW (CONTINUED)

- (2) VOC emissions from any combustion sources shall count towards the source wide emission limits in Section D of this permit.

d. Installation of one or more in-line corona treaters

e. Change of existing equipment configuration, web thread-up, air handling; sequence of operations, etc. Use of new and/or reformulated coating materials: VOC and HAP emissions shall count towards the emission limits in Section B and the source wide emission limits in Section D of this permit.

f. Installation of one or more items of supporting equipment which are affiliated operations of 40 CFR 63, Subpart JJJJ. Affiliated operations include, but are not limited to, mixing or dissolving of coating ingredients, coating mixing for viscosity adjustment, color tint or additive blending, pH adjustment, cleaning of coating lines and coating line parts; handling and storage of coatings and solvent; and conveyance and treatment of wastewater.

(1) ~~Any volatile organic liquid storage vessels must be less than 19,813 gallons (75 cubic meters) to preclude applicability of 40 CFR Part 60, Subpart Kb.~~

(2) Installation of a Miscellaneous Coating Manufacturing source subject to 40 CFR 63, Subpart HHHHH is not authorized by this permit.

(3) Installation or modification of Organic Liquid Distribution source subject to 40 CFR 63, Subpart EEEE is not authorized by this permit.

(4) Any additional VOC emissions associated with the installation and operation of supporting equipment shall count towards the source wide emission limits in Section D of this permit.

(5) If required the Division may require testing using U.S. EPA reference test methods or Division approved alternatives to establish total emissions, emission rates, or emission factors from the affected facilities.

2. Install or construct one or more web coating lines, including an in-line corona treater, and/or drying or curing ovens, and/or print stations, if applicable, which are subject to one or more of the following; 401 KAR 59:210, 401 KAR 59:212, 40 CFR 63, Subpart JJJJ, and/or 40 CFR 60, Subpart RR.

a. All oven burners or other combustion sources of the web coating line constructed according to this paragraph shall be limited to using natural gas or propane. Heat for drying may otherwise be provided by electricity or steam from an existing indirect heat exchanger or boiler.

(1) Any new combustion source may not contain any type of heat exchanger subject to 401 KAR 59:015, 40 CFR 60, Subpart Dc, or 40 CFR 63, Subpart DDDDD.

(2) VOC emissions from the combustion of fuel shall count towards the source wide emission limits in Section D of this permit.

Request language be updated to similar format used in other items below:

Installation of Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) subject to 40 CFR 60, Subpart Kb is not authorized by this permit.

ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW (CONTINUED)

b. Compliance for any newly constructed web coating lines will be demonstrated in accordance with Section B of this permit.

- (1) Pursuant to 401 KAR 59:212, Section 1 (4)(j), all units in a machine which has both coating and printing units shall be considered as performing a printing operation and will be subject to 401 KAR 59:212 and not 401 KAR 59:210.
- (2) The total mass of mass of materials used on the all the designated printing stations in each line shall be less than 5% of the total mass of material used on the coating line to preclude applicability of 40 CFR 63, Subpart KK.
- (3) Compliance with 401 KAR 59:210 or 401 KAR 59:212 as applicable shall be demonstrated daily.
- (4) The new coating line(s) shall also be subject to the specific monitoring, recordkeeping, and reporting requirements in Section B, F and G of this permit.
- (5) The permittee shall use VOC as a surrogate for HAP in all coating materials when demonstrating compliance with 40 CFR 63, Subpart JJJJ. The permittee is not required to ~~demonstration~~ demonstrate compliance independently with 40 CFR 60, Subpart RR, when VOC is used as a surrogate for HAP, and compliance has been demonstrated for 40 CFR 63, Subpart JJJJ.

demonstrate

c. VOC emissions from any new coating lines will count towards the source wide emission limits in Section D of this permit.

d. If the proposed coating line meets all the criteria of paragraph 2 under the total mass of materials used on all designated printing stations coating line exceeds 5% of the total mass of material used on that given line, the permittee shall submit for a minor permit revision under 401 KAR 52:020, Section 14, along with copies of the initial notification for 40 CFR 60, Subpart KK as required by 40 CFR 63.9 to both the Division and the U.S. EPA Region 4.

Include option for MACT JJJJ line to remain subject to MACT JJJJ even after crossing 5% threshold under §63.3300(i)

This update also needs to be cascaded to 3(a) (1-4), as relevant.

Remove 1R. The line has been decommissioned.

~~Installation of one or more flexographic printers to the 1R, 2R, 3R, and/or 4R lines which are subject to 401 KAR 59:212, 40 CFR 63, Subpart JJJJ, and 40 CFR 60, Subpart RR as applicable, as long as the total mass of mass of materials used on the all the designated printing stations in each line is less than 5% of the total mass of material used on the coating line to preclude applicability of 40 CFR 63, Subpart KK.~~

a. Compliance will be demonstrated in accordance with Section B of this permit.

- (1) All applicators / work stations of the affected coating line(s) ~~1R, 2R, 3R, and/or 4R~~ which receives installation of one or more flexographic printers will be subject to the requirements of 401 KAR 59:212 as given in Section B of this permit. 401 KAR 59:210 will no longer be applicable to the affected coating line modified under this paragraph.
- (2) Compliance with 401 KAR 59:212 shall be demonstrated daily.

Replace redline language with the following from 63.3300 (i):
applicable. Any web coating line subject to this part that is modified to include printing activities, may continue to demonstrate compliance with this part, in lieu of demonstrating compliance with subpart KK of this part. Any web coating line with product and packaging rotogravure print station(s) and/or a wide-web flexographic print station(s) that is subject to this subpart may elect to continue demonstrating compliance with this subpart in lieu of subpart KK of this part, if the mass of the materials applied to the line's print station(s) in a month ever exceed 5 percent of the total mass of materials applied onto the line during the same period.

**ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW
(CONTINUED)**

Request redline language be replaced with the following:

If the proposed project meets all the criteria of paragraph b under this heading except the total mass of materials used on all designated printing stations, existing and proposed, exceeds 5% of the total mass of material used on a given line the permittee may elect to continue demonstrating compliance with Subpart JJJJ or shall submit for a minor permit revision under 401 KAR 52:020, Section 14, along with copies of the initial notification for 40 CFR 63, Subpart KK as required by 40 CFR 63.9 to both the Division and the U.S. EPA Region 4.

- (3) The permittee shall continue to demonstrate compliance with all other applicable requirements of these lines according to Section B including monitoring, recordkeeping and reporting requirements in Section B, F and G of this permit.
- (4) ~~If the proposed project meets all the criteria of paragraph 1 under this heading except the total mass of materials used on all designated printing stations exceeds 5% of the total mass of material used on a given line the permittee shall first submit for a minor permit revision under 401 KAR 52:020, Section 14, along with copies of the initial notification for 40 CFR 60, Subpart KK as required by 40 CFR 63.9 to both the Division and the U.S. EPA Region 4.~~
4. Install, construct, or modify one or more thermal oxidizers, catalytic oxidizers, or solvent recovery units for control of VOC and/or organic HAP emissions from part or all of any one or several web coating lines, as may be needed to meet applicable VOC or organic HAP emissions limitations.
- The permittee shall demonstrate capture and control efficiency for each new control device or modification of a control device or capture system pursuant to 40 CFR 63, Subpart JJJJ, and the testing requirements in Section B and G of this permit. The permittee is not required to test removal efficiency of a solvent recovery device utilizing a continuous emission monitoring system (CEMS).
 - The permittee shall not construct or operate a solvent recovery device for which control efficiency is determined by a liquid-liquid material balance. If the permittee chooses to use a liquid-liquid material balance as provided for by 40 CFR 63, Subpart JJJJ, the permittee shall first submit for a minor permit revision under 401 KAR 52:020, Section 14.
 - Design and installation of monitoring equipment for capture systems and control devices shall be in accordance with Section E of this permit and 40 CFR 63, Subpart JJJJ.
 - Pursuant to 40 CFR 63.3350(c) for all intermittently controlled work stations, the permittee must monitor bypasses of a control device and the mass of each coating material applied at the work station during any such bypass.
 - The permittee shall update the site specific monitoring plan, the inspection and maintenance plan, and the startup, shutdown, and malfunction plan as necessary in accordance with Section E of this permit and 40 CFR 63, Subpart JJJJ.
 - Operating limitations for control devices associated with the web coating lines are given in Section B of this permit. The permittee shall also be subject to the monitoring, recordkeeping, and reporting requirements for the webcoating lines in Sections B, F and G of this permit.
 - The permittee is not authorized to remove a control device utilized to meet an emission limit issued pursuant to 401 KAR 51:017, unless alternate operating scenarios provided for in Section B of this permit.

**ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW
(CONTINUED)**

5. Re-assignment of control devices to any combination of workstations of the web coating lines.

Add the following language after "JJJJ":
that could reasonably result in a decrease in efficiency

- a. The permittee shall demonstrate capture and control efficiency for each modification of a control device or capture system pursuant to 40 CFR 63, Subpart JJJJ, and the testing requirements in Section B and G of this permit. The permittee is not required to test removal efficiency of a solvent recovery device utilizing a continuous emission monitoring system (CEMS).
- b. The permittee shall not operate a solvent recovery device for which control efficiency is determined by a liquid-liquid material balance. If the permittee chooses to use a liquid-liquid material balance as provide for by 40 CFR 63, Subpart JJJJ, the permittee shall first submit for a minor permit revision under 401 KAR 52:020, Section 14.
- c. Design and installation of monitoring equipment for capture systems and control devices shall be in accordance with Section E of this permit and 40 CFR 63, Subpart JJJJ.
- d. Pursuant to 40 CFR 63.3350 (c) for all intermittently controlled work stations, the permittee must monitor bypasses of a control device and the mass of each coating material applied at the work station during any such bypass.
- e. The permittee shall update site specific monitoring plan, the inspection and maintenance plan, ~~and the startup, shutdown, and malfunction plan~~ as necessary in accordance with Section E of this permit and 40 CFR 63, Subpart JJJJ.
- f. Operating limitations for control devices associated with the web coating lines are given in Section B of this permit. The permittee shall also be subject to the monitoring, recordkeeping, and reporting requirements for the webcoating lines in Sections B, F and G of this permit.
- g. The permittee is not authorized to remove a control device utilized to meet an emission limit issued pursuant to 401 KAR 51:017, unless alternate operating scenarios provided in Section B of this permit.

Remove language. SSM Plan is no longer required under MACT JJJJ

Notifications

1. 3M Cynthiana shall notify the Division and the U.S. EPA in writing at least seven (7) workdays prior to making each change. The notification shall include:
 - a. A brief description of the change;
 - b. The anticipated date on which the change will occur;
 - c. Any change in emissions or pollutants that result from the change; including,

**ATTACHMENT A – ADVANCE MINOR NEW SOURCE REVIEW
(CONTINUED)**

- (1) Information sufficient to update the Kentucky Emission Inventory System (KYEIS);
 - (2) A description of how VOC emissions will be tracked against existing emission limits and the source wide VOC cap, including a description of emissions factors, if relevant;
 - (3) Stack parameters: diameter, stack height, flow rate, and temperature as applicable;
 - (4) Material Safety Data Sheets (MSDS) or certified product data sheets with the manufacturer's formulation data for new materials.
- d. Any new applicable requirements that will apply after the change; or
- e. Any permit term or condition that will no longer be applicable after the change.
2. If a proposed project is revised or subsequently modified during the construction phase before startup of the affected facilities has occurred, the permittee shall promptly notify the Division of any supplementary facts or corrected information in accordance with 401 KAR 52:020, Section 7. The term promptly, as used here is defined to mean prior to the start-up date.
 3. A project meeting the criteria of this permit section and constructed accordingly may be subsequently modified following the start-up date of the affected facilities as long as the subsequent modification also meets the criteria of the preconstruction review given in this permit section. Such a modification will be considered a new project, and the permittee shall submit the applicable information in paragraphs 1, 4, and 5 under this heading.
 4. Within thirty (30) days following commencement of construction and within fifteen (15) days following start-up and attainment of the maximum production rate specified in the application, the permittee shall furnish to the Regional Office listed on the front of this permit in writing, notification of the following:
 - a. The date when construction commenced.
 - b. The date of start-up of the affected facilities.
 - c. The date when the maximum production rate was achieved.
 5. Within sixty (60) days after achieving the maximum production rate at which the affected facilities will be operated but not later than 180 days after initial start-up of such facilities, the permittee shall conduct a performance demonstration on the affected facilities in accordance with 401 KAR 50:055, General compliance requirements. If the permittee is required to demonstrate capture and/or control efficiency as part of a performance demonstration following modification or installation of a control device or capture system, the permittee shall also submit the notifications listed in Section G, paragraph 5.a of this permit.
 6. All claims of confidentiality of records must be made according to 400 KAR 1:060.

ATTACHMENT B – EQUATIONS AND PROCEDURES**AS REFERENCED BY 401 KAR 59:212**

The following compliance demonstration methods correspond with the exemptions provided by 401 KAR 59.212 Section 6. The following numbering corresponds with the numbering in the aforementioned section of the permit.

Compliance Demonstration Method:

- (3) Calculate the fractions of the volatile components in the “as supplied” ink or coating.

$$\% \text{ volume solvent} = \frac{\sum_{i=1}^n (\text{weight \% solvent})_i [\text{ink density (lbs/gal)}]}{\sum_{i=1}^n (\text{solvent density})_i}$$

$$\% \text{ volume water} = \frac{(\text{weight \% water}) [\text{ink density (lbs/gal)}]}{8.34 (\text{lbs/gal})}$$

$$\% \text{ volume E.S.} = \frac{\sum_{i=1}^n (\text{weight \% exempt solvent})_i [\text{ink density (lbs/gal)}]}{\sum_{i=1}^n (\text{exempt solvent density})_i}$$

- (4) Calculate the fractions of the volatile components in the “as supplied” ink (or coating). Exempt solvents are considered equivalent to water for the purpose of compliance demonstration, [401 KAR 59:212, Section 4, (5)].

$$(\text{VOC})_s = \frac{\% \text{ volume solvent}}{\% \text{ volume solvent} + \% \text{ volume water} + \% \text{ volume E.S.}}$$

$$(\text{H}_2\text{O})_s = \frac{\% \text{ volume water} + \% \text{ volume E.S.}}{\% \text{ volume solvent} + \% \text{ volume water} + \% \text{ volume E.S.}}$$

Where:

$(\text{VOC})_s$ = VOC content of “as supplied” ink or coating

$(\text{H}_2\text{O})_s$ = Water content of “as supplied” ink or coating

- (5) An ink or coating, delivered to the applicator, “as supplied”, for which $(\text{VOC})_s \leq 0.25$, and $(\text{H}_2\text{O})_s \geq 0.75$ is considered to be compliant with 401 KAR 59:212, Section 6, Exemption 1.
- (6) Calculate the fractions of the volatile components in an “as applied” ink.

$$(\text{VOC})_A = \frac{(\text{vol. compt.})_1 (\text{VOC}_s)_1 + (\text{vol. compt.})_2 (\text{VOC}_s)_2 + \dots + (\text{vol. compt.})_n (\text{VOC}_s)_n}{(\text{vol. compt.})_1 + (\text{vol. compt.})_2 + \dots + (\text{vol. compt.})_n}$$

$$(\text{H}_2\text{O})_A = \frac{(\text{vol. compt.})_1 (\text{H}_2\text{O}_s)_1 + (\text{vol. compt.})_2 (\text{H}_2\text{O}_s)_2 + \dots + (\text{vol. compt.})_n (\text{H}_2\text{O}_s)_n}{(\text{vol. compt.})_1 + (\text{vol. compt.})_2 + \dots + (\text{vol. compt.})_n}$$

Where:

$(\text{VOC})_A$ = VOC content of “as applied” ink or coating

$(\text{H}_2\text{O})_A$ = Water content of “as applied” ink or coating

- (7) An ink or coating, “as applied”, for which $(\text{VOC})_A \leq 0.25$, and $(\text{H}_2\text{O})_A \geq 0.75$ is considered to be compliant with 401 KAR 59:212, Section 6, Exemption 1.

ATTACHMENT B – EQUATIONS AND PROCEDURES**AS REFERENCED BY 401 KAR 59:212**

- (8) If an ink or coating, “as supplied”, is compliant with 401 KAR 59:212, Section 6, Exemption 1, and the volatile portion of any dilutants or additives added to the “as supplied” ink, consist of only water or exempt solvent, then the “as applied” ink is also considered to meet the exemption.
- (9) Determine the coating solids content “as supplied” from the manufacturer’s formulation data in accordance with Section D.4, paragraph a.

Where:

(Solids)_S = Solids content of “as supplied” ink or coating

- (10) An ink or coating, delivered to the applicator, “as supplied”, for which (Solids)_S ≥ 0.60 is considered to be compliant with 401 KAR 59:212, Section 6, Exemption 3.
- (11) Calculate the fractions of the nonvolatile components in the “as applied” ink or coating.

$$(\text{Solids})_A = \frac{(\text{Solids})_S}{1 + R_d}$$

Where:

(Solids)_A = Volume percent solids (nonvolatile) “as applied”

R_d = Dilution solvent ratio, equals the volume of VOC added per unit volume of ink or coating “as supplied”

- (12) An ink or coating, delivered to the applicator, “as applied”, for which (Solids)_A ≥ 0.60 is considered to be compliant with 401 KAR 59:212, Section 6, Exemption 3.
- (13) Alternatively, calculate the VOC content of all coating materials on the basis of coating solids applied:

$$V_s = \frac{\sum_{i=1}^n C_{vi} M_i + \sum_{j=1}^m C_{vij} M_{ij} - M_{vret}}{\sum_{i=1}^n C_{si} M_i + \sum_{j=1}^m C_{sij} M_{ij}}$$

Where:

V_s = Daily average, as-applied, VOC to coating solids ratio, lb VOC / lb coating solids applied.

n = Number of different coating materials applied during the day.

C_{vi} = Volatile organic content of coating material, i, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i, applied, lb.

m = Number of different materials added to the coating material.

C_{vij} = Volatile organic content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j, added to as purchased coating material, i, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, lb/lb.

C_{sij} = Coating solids content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

- (14) If each ink or coating material as-applied contains less than five-tenths (0.5) lb VOC/lb solids as delivered to the applicator then that ink or coating is considered to be compliant with 401 KAR 59:212, Section 6, Exemption 4.

ATTACHMENT B – EQUATIONS AND PROCEDURES

AS REFERENCED BY SECTION D

The following numbering corresponds with the numbering in Section D of the permit.

5. VOC and HAP Applied:

The following equations can be used to determine the VOC and HAP input to an individual applicator / work station, a group of applicators / work stations which are part of a coating line, or to an entire coating line as a single group. The VOC or HAP emitted from an uncontrolled applicator / work station is equal to the VOC or HAP applied on that applicator / work station minus the mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere.

a. *VOC and HAP applied on a monthly basis.*

(1) Calculate the **monthly** HAP input using Equation 1a.

$$H_m = \sum_{i=1}^p C_{hi} M_i + \sum_{j=1}^q C_{hij} M_{ij} \quad \text{Eq. 1a}$$

Where:

H_m = Total monthly organic HAP applied, lb.

p = Number of different coating materials applied in a month.

C_{hi} = Organic HAP content of coating material, i , as-purchased, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i , applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{hij} = Organic HAP content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.

(2) Calculate the **monthly** VOC input using Equation 1b.

$$V_m = \sum_{i=1}^p C_{vi} M_i + \sum_{j=1}^q C_{vij} M_{ij} \quad \text{Eq. 1b}$$

Where:

V_m = Total monthly VOC applied, lb.

p = Number of different coating materials applied in a month.

C_{vi} = Volatile organic content of coating material, i , as-purchased, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i , applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{vij} = VOC content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.

b. *VOC applied on a daily basis.*

(1) Calculate the **daily** VOC input using Equation 1c.

ATTACHMENT B – EQUATIONS AND PROCEDURES**AS REFERENCED BY SECTION D**

$$V_a = \sum_{i=1}^n C_{vi} M_i + \sum_{j=1}^m C_{vij} M_{ij} \quad \text{Eq. 1c}$$

Where:

- V_a = Total daily VOC input to the applicators / work stations, lb.
 n = Number of different coating materials applied each day.
 C_{vi} = Volatile organic content of coating material, i, as-purchased, expressed as a mass fraction, lb/lb.
 M_i = Mass of as-purchased coating material, i, applied during the day, lb.
 m = Number of different materials added to the coating material each day.
 C_{vij} = VOC content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.
 M_{ij} = Mass of material, j, added to as purchased coating material, i, during to day, lb.

6. Compliant Coatings:

Use the following equations for each coating line, portion of a coating line, or an individual applicator / work station which uses low VOC and HAP containing materials.

a. *Use of “as-purchased” compliant coating materials.*

- (1) The permittee may demonstrate compliance with an emission standard by showing that **each coating material** applied, “as-purchased” at an affected source meets the applicable mass fraction of coating or mass fraction of solids standard.
- (2) Determine the VOC and/or HAP content of each coating material using the methods specified in Section D.4.a & b of this permit.
- (3) If the as-purchased coating material is applied to the web without any solvent or other material added, then the as-applied VOC mass fraction is equal to the as-purchased VOC mass fraction and the as-applied coating solids content is equal to the as-purchased coating solids content, 40 CFR 63.3360(d)(3).
- (4) If the as-purchased coating material is applied to the web without any solvent or other material added, then the as-applied organic HAP mass fraction is equal to the as-purchased organic HAP mass fraction, 40 CFR 63.3360(c)(4).

b. *Use of “as-applied” compliant coating materials to meet mass fraction of coating material standards.*

- (1) The permittee may demonstrate compliance with an emission standard by showing that **each coating material** “as-applied” at an affected source meets the applicable mass fraction of coating standard.
- (2) The permittee must calculate the as-applied organic HAP (or VOC) content of as-purchased coating materials which are reduced, thinned, or diluted prior to application, 40 CFR 63.3370(c)(1).
- (3) Determine the organic HAP (or VOC) content of each coating material on an as purchased basis in accordance with Section D.4, paragraphs a & b.

ATTACHMENT B – EQUATIONS AND PROCEDURES**AS REFERENCED BY SECTION D**

- (4) Calculate the **average monthly**, as-applied organic HAP content of **each coating material** using Equation 2a of this section: [40 CFR 63.3370(c)(1)(ii)].

$$C_{ahi} = \frac{\left(C_{hi}M_i + \sum_{j=1}^q C_{hij}M_{ij} \right)}{M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 2a}$$

Where:

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i, expressed as a mass fraction, lb/lb.

C_{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i, applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, lb.

M_i = Mass of as-purchased coating material, i, applied in a month, lb.

- (5) Alternatively, calculate the **average monthly**, as-applied volatile organic content of **each coating material** using Equation 2b of this section: [40 CFR 63.3370(c)(1)(ii)].

$$C_{avi} = \frac{\left(C_{vi}M_i + \sum_{j=1}^q C_{vij}M_{ij} \right)}{M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 2b}$$

Where:

C_{avi} = Monthly average, as-applied, volatile organic content of coating material, i, expressed as a mass fraction, lb/lb.

C_{vi} = Volatile organic content of coating material, i, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i, applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{vij} = Volatile organic content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, lb.

- (6) If the **daily average** volatile organic content of **each coating material** as delivered to the applicators contains no more than 2.9 lb/gal VOC using Equation 2c, the affected facility is exempt from the control requirements of 401 KAR 59:210, Section 3. [59:210, Section 6(1)].

ATTACHMENT B – EQUATIONS AND PROCEDURES

AS REFERENCED BY SECTION D

$$C_{agi} = \frac{C_{gi}G_i + \sum_{j=1}^m C_{gij}G_{ij}}{G_i + \sum_{j=1}^m G_{ij}} \quad \text{Eq. 2c}$$

Where:

- C_{agi} = Daily average, as-applied, volatile organic content of coating material, i, expressed as a weight fraction, lb/gal.
- C_{gi} = Volatile organic content of coating material, i, expressed as a weight fraction, lb/gal.
- G_i = Number of gallons of as-purchased coating material, i, applied each day.
- m = Number of different materials added to the coating material each day.
- C_{gij} = Volatile organic content of material, j, added to as-purchased coating material, i, expressed as a weight fraction, lb/gal.
- G_{ij} = Number of gallons of material, j, added to as-purchased coating material, i, during the day.

c. *Use of “as-applied” compliant coating materials to meet mass fraction of coating solids standards.*

- (1) The permittee may demonstrate compliance with an emission standard by showing that **each coating material**, “as-applied” at an affected source meets the applicable mass fraction of coating solids standards.
- (2) Calculate the **monthly average**, as-applied coating solids content of coating materials which are reduced, thinned, or diluted prior to application, using Equation 3 of this section:

$$C_{asi} = \frac{\left(C_{si}M_i + \sum_{j=1}^q C_{sij}M_{ij} \right)}{M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 3}$$

Where:

- C_{asi} = Monthly average, as-applied, coating solids content of coating material, i, expressed as a mass fraction, lb/lb.
- C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, lb/lb.
- M_i = Mass of as-purchased coating material, i, applied in a month, lb.
- q = number of different materials added to the coating material each month.
- C_{sij} = Coating solids content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.
- M_{ij} = Mass of material, j, added to as-purchased coating material, i, in a month, lb.
- (3) Calculate the **monthly average**, as-applied organic HAP to coating solids ratio of **each coating material** using Equation 4a of this section:

$$H_{si} = \frac{C_{ahi}}{C_{asi}} \quad \text{Eq. 4a}$$

ATTACHMENT B – EQUATIONS AND PROCEDURES

AS REFERENCED BY SECTION D

Where:

H_{si} = As-applied, organic HAP to coating solids ratio of coating material, i.

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 2a.

C_{asi} = Monthly average, as-applied, coating solids content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 3.

- (4) Alternatively, calculate the **monthly average**, as-applied VOC to coating solids ratio of **each coating material** using Equation 4b of this section:

$$V_{si} = \frac{C_{avi}}{C_{asi}} \quad \text{Eq. 4b}$$

Where:

V_{si} = As-applied, VOC to coating solids ratio of coating material, i.

C_{avi} = Monthly average, as-applied, volatile organic content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 2b.

C_{asi} = Monthly average, as-applied, coating solids content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 3.

- d. *Monthly average organic HAP or VOC content of all coating materials “as-applied” is less than the applicable mass percent emission limits.*

- (1) The permittee may demonstrate compliance with an emission standard by showing that the **monthly average** VOC or HAP content of **all coating materials** “as-applied” at an affected source meets the applicable mass fraction of coatings standards.
- (2) Calculate the **monthly average** as-applied organic HAP content of **all coating materials** applied by Equation 5a of this section:

$$H_L = \frac{\sum_{i=1}^p C_{hi} M_i + \sum_{j=1}^q C_{hij} M_{ij} - M_{vret}}{\sum_{i=1}^p M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 5a}$$

Where:

H_L = Monthly average, as-applied, organic HAP content of all coating materials applied, expressed as lb organic HAP per lb of coating material applied, lb/lb.

p = Number of different coating materials applied in a month.

C_{hi} = Organic HAP content of coating material, i, as-purchased, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i, applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{hij} = Organic HAP content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j, added to as purchased coating material, i, in a month, lb.

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M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb. The value of this term will be zero in all cases except where you choose to take into account the volatile matter retained in the coated web or otherwise not emitted to the atmosphere for the compliance demonstration procedures in 40 CFR 63.3370.

- (3) Alternatively, calculate the **monthly average** as-applied VOC content of **all coating materials** applied by Equation 5b of this section:

$$V_L = \frac{\sum_{i=1}^p C_{vi} M_i + \sum_{j=1}^q C_{vij} M_{ij} - M_{vret}}{\sum_{i=1}^p M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 5b}$$

Where:

V_L = Monthly average, as-applied, VOC content of all coating materials applied, expressed as lb VOC per lb of coating material applied, lb/lb.

p = Number of different coating materials applied in a month.

C_{vi} = Volatile organic content of coating material, i , expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i , applied in a month, lb.

q = number of different materials added to the coating material each month.

C_{vij} = Volatile organic content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

- e. *Daily average VOC content of all coating materials “as-applied” is less than the applicable mass of VOC per gallon of coating material limit.*

- (1) The permittee may show compliance with 401 KAR 59:210, Section 6, Exemption (1), by demonstrating that the **daily average** volatile organic content of **all coating materials** as delivered to the applicators is less than 2.9 lb/gal.

- (2) Calculate the **daily average** as-applied VOC content of **all coating materials** applied using Equation 5c:

$$V_G = \frac{\sum_{i=1}^n C_{gi} G_i + \sum_{j=1}^m C_{gij} G_{ij}}{\sum_{i=1}^n G_i + \sum_{j=1}^m G_{ij}} \quad \text{Eq. 5c}$$

Where:

V_G = Daily average, as-applied, VOC content of all coating materials applied, expressed as lb VOC per gallon of coating material applied, lb/gal.

n = Number of different coating materials applied each day.

C_{gi} = Volatile organic content of coating material, i , expressed as a weight fraction, lb/gal.

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- G_i = Number of gallons of as-purchased coating material, i , applied each day.
 m = Number of different materials added to the coating material each day.
 C_{gij} = Volatile organic content of material, j , added to as-purchased coating material, i , expressed as a weight fraction, lb/gal.
 G_{ij} = Number of gallons of material, j , added to as-purchased coating material, i , during the day.

f. *Monthly average organic HAP or VOC content of all coating materials “as-applied” is less than the applicable mass fraction of coating solids emission limits.*

- (1) The permittee may demonstrate compliance with an emission standard by showing that the **monthly average** VOC or HAP content of **all coating materials** “as-applied” at an affected source meets the applicable mass fraction of coating solids standards.
- (2) Calculate the **monthly average** as-applied organic HAP content of **all coating materials** on the basis of coating solids applied, by using Equation 6a of this section:

$$H_s = \frac{\sum_{i=1}^p C_{hi} M_i + \sum_{j=1}^q C_{hij} M_{ij} - M_{vret}}{\sum_{i=1}^p C_{si} M_i + \sum_{j=1}^q C_{sij} M_{ij}} \quad \text{Eq. 6a}$$

Where:

- H_s = Monthly average, as-applied, organic HAP to coating solids ratio, lb organic HAP/lb coating solids applied.
 p = Number of different coating materials applied in a month.
 C_{hi} = Organic HAP content of coating material, i , as-purchased, expressed as a mass fraction, lb/lb.
 M_i = Mass of as-purchased coating material, i , applied in a month, lb.
 q = number of different materials added to the coating material each month.
 C_{hij} = Organic HAP content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.
 M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.
 M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.
 C_{si} = Coating solids content of coating material, i , expressed as a mass fraction, lb/lb.
 C_{sij} = Coating solids content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.
- (3) Alternatively, calculate the **monthly average** as-applied VOC content of **all coating materials** on the basis of coating solids applied by Equation 6b of this section:

ATTACHMENT B – EQUATIONS AND PROCEDURES**AS REFERENCED BY SECTION D**

$$V_s = \frac{\sum_{i=1}^p C_{vi} M_i + \sum_{j=1}^q C_{vij} M_{ij} - M_{vret}}{\sum_{i=1}^p C_{si} M_i + \sum_{j=1}^q C_{sij} M_{ij}} \quad \text{Eq. 6b}$$

Where:

- V_s = Monthly average, as-applied, VOC to coating solids ratio, lb VOC / lb coating solids applied.
- p = Number of different coating materials applied in a month.
- C_{vi} = Volatile organic content of coating material, i , expressed as a mass fraction, lb/lb.
- M_i = Mass of as-purchased coating material, i , applied in a month, lb.
- q = number of different materials added to the coating material each month.
- C_{vij} = Volatile organic content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.
- M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.
- M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.
- C_{si} = Coating solids content of coating material, i , expressed as a mass fraction, lb/lb.
- C_{sij} = Coating solids content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

7. Use of Capture and Control with Always-Controlled Work Stations:

Use the following equations for each coating line, portion of a coating line, or an individual applicator / work station which utilizes capture and control throughout the month.

a. *Capture and control to reduce emissions to no more than allowable limit*

- (1) Demonstrate initial compliance for each capture system and each control device through performance tests.
- (2) Calculate the overall control efficiency using Equation 7 of this section:

$$R = \frac{(E)(CE)}{100} \quad \text{Eq. 7}$$

Where:

- R = Overall organic HAP / VOC control efficiency, percent.
- E = Organic volatile matter control efficiency of the control device, percent.
- CE = Organic volatile matter capture efficiency of the capture system, percent.
- (3) Demonstrate continuing compliance through continuous monitoring of capture system and control device operating parameters.

b. *VOC and HAP emitted on a monthly basis*

- (1) Calculate the organic HAP emitted **during the month** using Equation 8a of this section:

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$$H_e = [1 - R] \left[\sum_{i=1}^p C_{ahi} M_i \right] - M_{vret} \quad \text{Eq. 8a}$$

Where:

H_e = Total monthly organic HAP emitted, lb.

p = Number of different coating materials applied in a month.

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i , expressed as a mass fraction, lb/lb, from Equation 2a.

M_i = Mass of as-purchased coating material, i , applied in a month, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

- (2) Alternatively, calculate the VOC emitted **during the month** using Equation 8b:

$$V_e = [1 - R] \left[\sum_{i=1}^p C_{avi} M_i \right] - M_{vret} \quad \text{Eq. 8b}$$

Where:

V_e = Total monthly VOC emitted, lb.

p = Number of different coating materials applied in a month.

C_{avi} = Monthly average, as-applied, volatile organic content of coating material, i , expressed as a mass fraction, lb/lb, from Equation 2b.

M_i = Mass of as-purchased coating material, i , applied in a month, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

c. *VOC emitted on a daily basis*

- (1) Calculate the VOC emitted **during each day** using Equation 8c:

$$V_e = [1 - R] \left[\sum_{i=1}^n C_{vi} M_i + \sum_{j=1}^m C_{vij} M_{ij} \right] - M_{vret} \quad \text{Eq. 8c}$$

Where:

V_e = Total daily VOC emitted, lb.

n = Number of different coating materials applied each day.

C_{vi} = Volatile organic content of coating material, i , as-purchased, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i , applied during the day, lb.

m = Number of different materials added to the coating material.

C_{vij} = VOC content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j , added to as purchased coating material, i , during to day, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

d. *Demonstrating compliance based on a coating mass standard:*

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- (1) Calculate the organic HAP emission rate based on the mass of coating material applied using Equation 9a of this section:

$$S_h = \frac{H_e}{\sum_{i=1}^p M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 9a}$$

Where:

- S_h = Mass organic HAP emitted per mass of material applied, lb/lb.
 H_e = Total monthly organic HAP emitted, lb.
 p = Number of different coating materials applied in a month.
 M_i = Mass of as-purchased coating material, i , applied in a month, lb.
 q = Number of different materials added to the coating material.
 M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.

- (2) Alternatively, calculate the VOC emission rate based on the mass of coating material applied using Equation 9b:

$$S_v = \frac{V_e}{\sum_{i=1}^p M_i + \sum_{j=1}^q M_{ij}} \quad \text{Eq. 9b}$$

Where:

- S_v = Mass VOC emitted per mass of material applied, lb/lb.
 V_e = Total monthly VOC emitted, lb.
 p = Number of different coating materials applied in a month.
 M_i = Mass of as-purchased coating material, i , applied in a month, lb.
 q = Number of different materials added to the coating material.
 M_{ij} = Mass of material, j , added to as purchased coating material, i , in a month, lb.

e. *Demonstrating compliance based on a mass of coating solids standard:*

- (1) Calculate the organic HAP emission rate based on the mass of coating solids applied using Equation 10a of this section:

$$L_h = \frac{H_e}{\sum_{i=1}^p C_{si} M_i + \sum_{j=1}^q C_{sij} M_{ij}} \quad \text{Eq. 10a}$$

Where:

- L_h = Mass organic HAP emitted per mass of coating solids applied, lb/lb.
 H_e = Total monthly organic HAP emitted, lb.
 p = Number of different coating materials applied in a month.
 C_{si} = Coating solids content of coating material, i , expressed as a mass fraction, lb/lb.
 M_i = Mass of as-purchased coating material, i , applied in a month, lb.
 q = Number of different materials added to the coating material.
 C_{sij} = Coating solids content of material, j , added to as-purchased coating material, i , expressed as a mass fraction, lb/lb.

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M_{ij} = Mass of material, j, added to as purchased coating material, i, in a month, lb.

- (2) Alternatively, calculate the VOC emission rate based on the mass of coating solids applied using Equation 10b of this section:

$$L_v = \frac{V_e}{\sum_{p=1}^p C_{si} M_i + \sum_{q=1}^q C_{sij} M_{ij}} \quad \text{Eq. 10b}$$

Where:

L_v = Mass VOC emitted per mass of coating solids applied, lb/lb.

V_e = Total monthly VOC emitted, lb.

p = Number of different coating materials applied in a month.

C_{si} = Coating solids content of coating material, i, expressed as a mass fraction, lb/lb.

M_i = Mass of as-purchased coating material, i, applied in a month, lb.

q = Number of different materials added to the coating material.

C_{sij} = Coating solids content of material, j, added to as-purchased coating material, i, expressed as a mass fraction, lb/lb.

M_{ij} = Mass of material, j, added to as purchased coating material, i, in a month, lb.

8. Use of Capture and Control with One or More Never-Controlled or Intermittently-Controlled Work Stations:

Use the following equations for each coating line or portion of a coating line in which some of the applicators / work stations use capture and control throughout the month, and other applicators / work stations within the group are uncontrolled throughout the month or intermittently controlled.

a. *Demonstrating compliance based on a coating mass standard:*

- (1) Calculate the organic HAP emitted *during the month* using Equation 11a of this section:

$$H_e = \left[\sum_{i=1}^p M_{Ci} C_{ahi} \right] \left[1 - \frac{R}{100} \right] + \left[\sum_{i=1}^p M_{Bi} C_{ahi} \right] - M_{vret} \quad \text{Eq. 11a}$$

Where:

H_e = Total monthly organic HAP emitted, lb.

p = Number of different coating materials applied in a month.

M_{Ci} = Sum of the mass of coating material, i, as-applied on intermittently-controlled work stations operating in controlled mode and the mass of coating material, i, as-applied on always-controlled work stations, in a month, lb.

C_{ahi} = Monthly average, as-applied, organic HAP content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 2a.

R = Overall organic HAP control efficiency, percent.

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M_{Bi} = Sum of the mass of coating material, i, as-applied on intermittently-controlled work stations operating in bypass mode and the mass of coating material, i, as-applied on never-controlled work stations, in a month, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

- (2) Alternatively, calculate the VOC emitted *during the month* using Equation 11b:

$$V_e = \left[\sum_{i=1}^p M_{Ci} C_{avi} \right] \left[1 - \frac{R}{100} \right] + \left[\sum_{i=1}^p M_{Bi} C_{avi} \right] - M_{vret} \quad \text{Eq. 11b}$$

Where:

V_e = Total monthly VOC emitted, lb.

p = Number of different coating materials applied in a month.

M_{Ci} = Sum of the mass of coating material, i, as-applied on intermittently-controlled work stations operating in controlled mode and the mass of coating material, i, as-applied on always-controlled work stations, in a month, lb.

C_{avi} = Monthly average, as-applied, volatile organic content of coating material, i, expressed as a mass fraction, lb/lb, from Equation 2b.

R = Overall VOC control efficiency, percent.

M_{Bi} = Sum of the mass of coating material, i, as-applied on intermittently-controlled work stations operating in bypass mode and the mass of coating material, i, as-applied on never-controlled work stations, in a month, lb.

M_{vret} = Mass of volatile matter retained in the coated web after curing or drying, or otherwise not emitted to the atmosphere, lb.

- (3) Calculate the organic HAP emission rate based on the mass of coating material applied using Equation 9a of this section:
- (4) Alternatively, calculate the VOC emission rate based on the mass of coating material applied using Equation 9b:

b. *Demonstrating compliance based on a mass of coating solids standard:*

- (1) Calculate the organic HAP emitted *during the month* using Equation 11a.
- (2) Alternatively, calculate the VOC emitted *during the month* using Equation 11b.
- (3) Calculate the organic HAP emission rate based on the mass of coating solids applied using Equation 10a.
- (4) Alternatively, calculate the VOC emission rate based on the mass of coating solids applied using Equation 10b.