

CERTIFIED MAIL-RETURN RECEIPT REQUESTED
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May 5, 2016

Mr. William F. Durham, Director
WV DEP-Division of Air Quality
601 57th Street S.E.
Charleston, West Virginia 25304

Dear Mr. Durham,

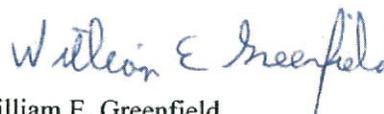
Attention: Carrie McCumbers
Title V Permits ManagerRE: Univation Technologies, LLC (UT)
South Charleston Catalyst Plant
Plant ID: 039-00618
Regulation 30 (Title V) Permit Application

Attached are two copies of the application on separate CDs for UT's South Charleston Catalyst Plant (SCCP). A printed copy of the General Form signed by the Plant Authorized Representative is also provided. Some of the information is considered business confidential and submitted in accordance with Regulation 31 provision.

UT became a subsidiary of The Dow Chemical Company in May 2015. Per communications with WVDAQ staff a Regulation 30 permit application needs to be filed within one year of the acquisition.

If you have any questions, please contact Freddie Sizemore by at (304) 747-3713 or me at (304) 747-3131 (or by email: bgreenfield@univation.com).

Sincerely yours,

William E. Greenfield
Production Leadercc: Ms. Zelma Maldonado, Associate Director (cover letter only)
Office of Air Enforcement and Compliance (3AP20)
U. S. Environmental Protection Agency, Region III
1650 Arch Street
Philadelphia, PA 19103-2029CERTIFIED Mail-RETURN RECEIPT REQUESTED
7012 2920 0000 2036 5106



WEST VIRGINIA DEPARTMENT OF ENVIRONMENTAL PROTECTION

DIVISION OF AIR QUALITY

601 57th Street SE
Charleston, WV 25304
Phone: (304) 926-0475
www.dep.wv.gov/daq

INITIAL/RENEWAL TITLE V PERMIT APPLICATION - GENERAL FORMS

Section I: General Information

1. Name of Applicant (As registered with the WV Secretary of State's Office): Univation Technologies LLC
2. Facility Name or Location: South Charleston Catalyst Plant
3. DAQ Plant ID No.: 039-00618
4. Federal Employer ID No. (FEIN): 76-0532064
5. Permit Application Type: [X] Initial Permit When did operations commence? 11/1/2011 (transfer from UCC)
6. Type of Business Entity: [X] LLC
7. Is the Applicant the: [X] Both
8. Number of onsite employees: Currently 13 - changes may occur as operational needs vary.
9. Governmental Code: [X] Privately owned and operated; 0
10. Business Confidentiality Claims: Does this application include confidential information (per 45CSR31)? [X] Yes

11. Mailing Address		
Street or P.O. Box: Univation Technologies		P. O. Box 8361
City: South Charleston	State: WV	Zip: 25303
Telephone Number: (304) 747-3131		Fax Number: (304) 776-7913

12. Facility Location		
Street: 1100 Science Park Drive	City: South Charleston	County: Kanawha
UTM Easting: 438.4 km (Building 706)	UTM Northing: 4,245.5 km (Building 706)	Zone: <input checked="" type="checkbox"/> 17 or <input type="checkbox"/> 18
Directions: Take I-64 west from Charleston, WV. Take Kanawha Turnpike Exit. Travel approximately ½ mile to West Virginia Regional Technology Park. Take 2 nd left at sign marked "Univation Technologies Building 706".		
Portable Source? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
Is facility located within a nonattainment area? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, for what air pollutants?	
Is facility located within 50 miles of another state? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, name the affected state(s). Ohio and Kentucky	
Is facility located within 100 km of a Class I Area¹? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, name the area(s).	
If no, do emissions impact a Class I Area¹? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
¹ Class I areas include Dolly Sods and Otter Creek Wilderness Areas in West Virginia, and Shenandoah National Park and James River Face Wilderness Area in Virginia.		

13. Contact Information		
Responsible Official/Authorized Representative: William E. Greenfield		Title: Production Leader
Street or P.O. Box: P. O. Box 8361		
City: South Charleston	State: WV	Zip: 25303
Telephone Number: (304) 747-3131	Fax Number: (304) 776-7913	
E-mail address: greenfwe@univation.com		
Environmental Contact: Freddie A. Sizemore		Title: Environmental Specialist
Street or P.O. Box: P. O. Box 8361		
City: South Charleston	State: WV	Zip: 25303
Telephone Number: (304) 747-3713	Fax Number: (304) 747-3147	
E-mail address: sizemofa2@dow.com		
Application Preparer:		Title:
Company:		
Street or P.O. Box:		
City:	State:	Zip: -
Telephone Number: () -	Fax Number: () -	
E-mail address:		

14. Facility Description

List all processes, products, NAICS and SIC codes for normal operation, in order of priority. Also list any process, products, NAICS and SIC codes associated with any alternative operating scenarios if different from those listed for normal operation.

Process	Products	NAICS	SIC
OMU2 Process	Miscellaneous Organic Chemicals	325199	2869
OMU3 Process	Miscellaneous Organic Chemicals	325199	2869

Provide a general description of operations.

The Univation Technologies South Charleston Catalyst Plant (SCCP) produces organo metallic compounds that are shipped to other companies for use. Ancillary operations include small boilers to supply steam, analytical quality assurance and control laboratories, and container storage/shipping.

Process feedstocks are received in containers. Process equipment used to make products include tanks, reactors, separation equipment, and condensers. A flare is used to control air emissions from process equipment vents.

40 CFR 63 Subpart 63 EEEE – National Emissions Standards for Hazardous Air Pollutants: Organic Liquids Distribution (Non-Gasoline). There are no transfer racks subject to control. However, a record of organic liquids containing 5% by weight or more of hazardous air pollutants unloaded must be kept.

40 CFR 63 Subpart FFFF - National Emission Standards for Hazardous Air Pollutants from Miscellaneous Organic Chemical Manufacturing Operations. UT's OMU2 and OMU3 Process are covered by Subpart FFFF.

- Attachment I - document titled "Attachment I-A UT OMU2 Applicable Reqt" lists applicable requirements and proposed monitoring, recordkeeping and reporting for the OMU2 Process.

- Attachment I – document titled "Attachment I-B UT OMU3 Applicable Reqt-MRR" lists applicable requirements and proposed monitoring, recordkeeping and reporting for the OMU3 Process

Other Facility wide requirements are listed in Item 20 below.

15. Provide an **Area Map** showing plant location as **ATTACHMENT A**.

16. Provide a **Plot Plan(s)**, e.g. scaled map(s) and/or sketch(es) showing the location of the property on which the stationary source(s) is located as **ATTACHMENT B**. For instructions, refer to "Plot Plan - Guidelines."

17. Provide a detailed **Process Flow Diagram(s)** showing each process or emissions unit as **ATTACHMENT C**. Process Flow Diagrams should show all emission units, control equipment, emission points, and their relationships.

Section 2: Applicable Requirements

18. Applicable Requirements Summary	
Instructions: Mark all applicable requirements.	
<input checked="" type="checkbox"/> SIP	<input type="checkbox"/> FIP
<input checked="" type="checkbox"/> Minor source NSR (45CSR13)	<input type="checkbox"/> PSD (45CSR14)
<input checked="" type="checkbox"/> NESHAP (45CSR34)	<input type="checkbox"/> Nonattainment NSR (45CSR19)
<input type="checkbox"/> Section 111 NSPS	<input type="checkbox"/> Section 112(d) MACT standards
<input type="checkbox"/> Section 112(g) Case-by-case MACT	<input type="checkbox"/> 112(r) RMP
<input type="checkbox"/> Section 112(i) Early reduction of HAP	<input type="checkbox"/> Consumer/commercial prod. reqts., section 183(e)
<input type="checkbox"/> Section 129 Standards/Reqts.	<input checked="" type="checkbox"/> Stratospheric ozone (Title VI)
<input type="checkbox"/> Tank vessel reqt., section 183(f)	<input type="checkbox"/> Emissions cap 45CSR§30-2.6.1
<input type="checkbox"/> NAAQS, increments or visibility (temp. sources)	<input type="checkbox"/> 45CSR27 State enforceable only rule
<input checked="" type="checkbox"/> 45CSR4 State enforceable only rule	<input type="checkbox"/> Acid Rain (Title IV, 45CSR33)
<input type="checkbox"/> Emissions Trading and Banking (45CSR28)	<input type="checkbox"/> Compliance Assurance Monitoring (40CFR64)
<input type="checkbox"/> CAIR NO _x Annual Trading Program (45CSR39)	<input type="checkbox"/> CAIR NO _x Ozone Season Trading Program (45CSR40)
<input type="checkbox"/> CAIR SO ₂ Trading Program (45CSR41)	

19. Non Applicability Determinations

List all requirements which the source has determined not applicable and for which a permit shield is requested. The listing shall also include the rule citation and the reason why the shield applies.

45 CSR Series 29 – Rule requiring the Submission of Emissions Statements for Volatile Organic Compound Emissions and Oxides of Nitrogen Emissions. VOC and NOx emissions are less than 25 tons/year. Only applies if requested by the Agency.

40 CFR 63 Subpart JJJJJ - National Emission Standards for Hazardous Air Pollutants for Area Sources: Industrial, Commercial, and Institutional Boilers. SCCP installed 2 small natural gas fired boilers in 2012. These boilers are not covered by this rule because only natural gas is used as fuel. (40 CFR § 63.11195(e)) The Site's potential to emit hazardous air pollutants was less than 10 tons per year of any individual HAP and less than 25 tons per year of all HAPs in aggregate prior to commencement of boiler construction.

40 CFR 64 Compliance Assurance Monitoring. SCCP's OMU2 and OMU3 processes not subject to Compliance Assurance Monitoring (CAM) rule because they are subject to 40 CFR Part 63 Subpart FFFF that was proposed after November 11, 1990.

40 CFR 68 Risk Management Plan. SCCP is not required to submit a risk management plan because the SCCP does not produce, handle, process, distribute, or store chemicals listed in 40 CFR § 68.130 at equal to or greater than threshold amounts. (40 CFR §68.130(a))

40 CFR 82, Subpart F, Recycling and Emissions Reduction: The mechanical (industrial) refrigeration equipment (Eq. ID# MRU) uses refrigerant HFC 404A. HFC 404A is a blend of 1,1,1-Trifluoroethane, Pentafluoroethane, and 1,1,1,2-Tetrafluoroethane. None of these compounds are listed as Class 1 or Class 2 refrigerants. Therefore, Subpart F does not apply to the mechanical refrigeration equipment. Copy of HFC 404A material safety data sheet is attached. Attachment J - document title "MSDS Genetron 404A".

Permit Shield

20. Facility-Wide Applicable Requirements

List all facility-wide applicable requirements. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements).

45 CSR Series 4 – To Prevent and Control the Discharge of Air Pollutants Into the Open Air which Causes or Contributes to an Objectionable Odor or Odors.

45 CSR Series 6 – To Prevent and Control Air Pollution from Combustion of Refuse.

45 CSR Series 13 – Permits for Construction, Modification, Relocation and Operation of Stationary Sources of Air Pollutants, Notification Requirements, Administrative Updates, Temporary Permits, General Permits, Permission to Commence Construction, and Procedures for Evaluation.

45 CSR Series 22 – Air Quality Management Fee Program.

45 CSR Series 30 – Requirements for Operating Permits.

45 CSR Series 34 – Emission Standards for Hazardous Air Pollutants, 40 CFR 61, Subpart M National Emission Standard for Asbestos.

40 CFR 82 Subpart F – Rule regarding the maintenance, service, repair or disposal of appliances.

Permit Shield

For all facility-wide applicable requirements listed above, provide monitoring/testing / recordkeeping / reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number and/or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

45 CSR Series 4 – Operating practices will be followed to limit air emissions.

45 CSR Series 6 – Operating and safety practices prohibit open burning .

45 CSR Series 13 – Changes in operations are reviewed and proper action taken to comply with permitting requirements.

45 CSR Series 22 – Applicable fees will be provided in accordance with Agency guideline and rule provisions.

45 CSR Series 30 – Changes in operations are reviewed and proper action taken to comply with permitting requirements.

45 CSR Series 34 – Notification of demolition or renovation activities involving asbestos containing material will be provided in accordance with 40 CFR Part 61, Subpart M.

40 CFR 82 Subpart F – Appropriate records will be maintained regarding the management of refrigerants covered by Subpart F provisions.

Are you in compliance with all facility-wide applicable requirements? Yes No

If no, complete the **Schedule of Compliance Form** as **ATTACHMENT F**.

22. Inactive Permits/Obsolete Permit Conditions

Permit Number	Date of Issuance	Permit Condition Number
R13-2631A	5/8/2009	4.1.11. The VOCs and toluene emissions being emitted from emission point AR9 shall not exceed 0.47 pounds per hour and 34 pounds per year. Emission Point AR9 no longer exists.
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Section 3: Facility-Wide Emissions

23. Facility-Wide Emissions Summary [Tons per Year]	
Criteria Pollutants	Potential Emissions
Carbon Monoxide (CO)	4.2
Nitrogen Oxides (NO _x)	2
Lead (Pb)	
Particulate Matter (PM _{2.5}) ¹	1
Particulate Matter (PM ₁₀) ¹	1
Total Particulate Matter (TSP)	1
Sulfur Dioxide (SO ₂)	0.1
Volatile Organic Compounds (VOC)	5.3
Hazardous Air Pollutants ²	Potential Emissions
Toluene	2
2,2,4-Trimethylpentane	3
Hexane	0.1
Regulated Pollutants other than Criteria and HAP	Potential Emissions

¹PM_{2.5} and PM₁₀ are components of TSP.
²For HAPs that are also considered PM or VOCs, emissions should be included in both the HAPs section and the Criteria Pollutants section.

Section 4: Insignificant Activities

24. Insignificant Activities (Check all that apply)	
<input type="checkbox"/>	1. Air compressors and pneumatically operated equipment, including hand tools.
<input type="checkbox"/>	2. Air contaminant detectors or recorders, combustion controllers or shutoffs.
<input checked="" type="checkbox"/>	3. Any consumer product used in the same manner as in normal consumer use, provided the use results in a duration and frequency of exposure which are not greater than those experienced by consumer, and which may include, but not be limited to, personal use items; janitorial cleaning supplies, office supplies and supplies to maintain copying equipment.
<input checked="" type="checkbox"/>	4. Bathroom/toilet vent emissions.
<input type="checkbox"/>	5. Batteries and battery charging stations, except at battery manufacturing plants.
<input checked="" type="checkbox"/>	6. Bench-scale laboratory equipment used for physical or chemical analysis, but not lab fume hoods or vents. Many lab fume hoods or vents might qualify for treatment as insignificant (depending on the applicable SIP) or be grouped together for purposes of description.
<input type="checkbox"/>	7. Blacksmith forges.
<input type="checkbox"/>	8. Boiler water treatment operations, not including cooling towers.
<input checked="" type="checkbox"/>	9. Brazing, soldering or welding equipment used as an auxiliary to the principal equipment at the source.
<input type="checkbox"/>	10. CO ₂ lasers, used only on metals and other materials which do not emit HAP in the process.
<input checked="" type="checkbox"/>	11. Combustion emissions from propulsion of mobile sources, except for vessel emissions from Outer Continental Shelf sources.
<input type="checkbox"/>	12. Combustion units designed and used exclusively for comfort heating that use liquid petroleum gas or natural gas as fuel.
<input checked="" type="checkbox"/>	13. Comfort air conditioning or ventilation systems not used to remove air contaminants generated by or released from specific units of equipment.
<input type="checkbox"/>	14. Demineralized water tanks and demineralizer vents.
<input type="checkbox"/>	15. Drop hammers or hydraulic presses for forging or metalworking.
<input type="checkbox"/>	16. Electric or steam-heated drying ovens and autoclaves, but not the emissions from the articles or substances being processed in the ovens or autoclaves or the boilers delivering the steam.
<input type="checkbox"/>	17. Emergency (backup) electrical generators at residential locations.
<input type="checkbox"/>	18. Emergency road flares.
<input type="checkbox"/>	19. Emission units which do not have any applicable requirements and which emit criteria pollutants (CO, NO _x , SO ₂ , VOC and PM) into the atmosphere at a rate of less than 1 pound per hour and less than 10,000 pounds per year aggregate total for each criteria pollutant from all emission units. Please specify all emission units for which this exemption applies along with the quantity of criteria pollutants emitted on an hourly and annual basis: _____ _____ _____ _____ _____ _____ _____ _____ _____

24. Insignificant Activities (Check all that apply)	
<input type="checkbox"/>	<p>20. Emission units which do not have any applicable requirements and which emit hazardous air pollutants into the atmosphere at a rate of less than 0.1 pounds per hour and less than 1,000 pounds per year aggregate total for all HAPs from all emission sources. This limitation cannot be used for any source which emits dioxin/furans nor for toxic air pollutants as per 45CSR27.</p> <p>Please specify all emission units for which this exemption applies along with the quantity of hazardous air pollutants emitted on an hourly and annual basis:</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p>
<input type="checkbox"/>	21. Environmental chambers not using hazardous air pollutant (HAP) gases.
<input type="checkbox"/>	22. Equipment on the premises of industrial and manufacturing operations used solely for the purpose of preparing food for human consumption.
<input type="checkbox"/>	23. Equipment used exclusively to slaughter animals, but not including other equipment at slaughterhouses, such as rendering cookers, boilers, heating plants, incinerators, and electrical power generating equipment.
<input checked="" type="checkbox"/>	24. Equipment used for quality control/assurance or inspection purposes, including sampling equipment used to withdraw materials for analysis.
<input type="checkbox"/>	25. Equipment used for surface coating, painting, dipping or spray operations, except those that will emit VOC or HAP.
<input type="checkbox"/>	26. Fire suppression systems.
<input type="checkbox"/>	27. Firefighting equipment and the equipment used to train firefighters.
<input type="checkbox"/>	28. Flares used solely to indicate danger to the public.
<input type="checkbox"/>	29. Fugitive emission related to movement of passenger vehicle provided the emissions are not counted for applicability purposes and any required fugitive dust control plan or its equivalent is submitted.
<input type="checkbox"/>	30. Hand-held applicator equipment for hot melt adhesives with no VOC in the adhesive formulation.
<input type="checkbox"/>	31. Hand-held equipment for buffing, polishing, cutting, drilling, sawing, grinding, turning or machining wood, metal or plastic.
<input type="checkbox"/>	32. Humidity chambers.
<input type="checkbox"/>	33. Hydraulic and hydrostatic testing equipment.
<input type="checkbox"/>	34. Indoor or outdoor kerosene heaters.
<input type="checkbox"/>	35. Internal combustion engines used for landscaping purposes.
<input type="checkbox"/>	36. Laser trimmers using dust collection to prevent fugitive emissions.
<input type="checkbox"/>	37. Laundry activities, except for dry-cleaning and steam boilers.
<input checked="" type="checkbox"/>	38. Natural gas pressure regulator vents, excluding venting at oil and gas production facilities.
<input type="checkbox"/>	39. Oxygen scavenging (de-aeration) of water.
<input type="checkbox"/>	40. Ozone generators.
<input checked="" type="checkbox"/>	41. Plant maintenance and upkeep activities (e.g., grounds-keeping, general repairs, cleaning, painting, welding, plumbing, re-tarring roofs, installing insulation, and paving parking lots) provided these activities are not conducted as part of a manufacturing process, are not related to the source's primary business activity, and not otherwise triggering a permit modification. (Cleaning and painting activities qualify if they are not subject to VOC or HAP control requirements. Asphalt batch plant

24. Insignificant Activities (Check all that apply)	
	owners/operators must still get a permit if otherwise requested.)
<input type="checkbox"/>	42. Portable electrical generators that can be moved by hand from one location to another. "Moved by Hand" means that it can be moved without the assistance of any motorized or non-motorized vehicle, conveyance, or device.
<input type="checkbox"/>	43. Process water filtration systems and demineralizers.
<input type="checkbox"/>	44. Repair or maintenance shop activities not related to the source's primary business activity, not including emissions from surface coating or de-greasing (solvent metal cleaning) activities, and not otherwise triggering a permit modification.
<input checked="" type="checkbox"/>	45. Repairs or maintenance where no structural repairs are made and where no new air pollutant emitting facilities are installed or modified.
<input type="checkbox"/>	46. Routing calibration and maintenance of laboratory equipment or other analytical instruments.
<input type="checkbox"/>	47. Salt baths using nonvolatile salts that do not result in emissions of any regulated air pollutants. Shock chambers.
<input type="checkbox"/>	48. Shock chambers.
<input type="checkbox"/>	49. Solar simulators.
<input type="checkbox"/>	50. Space heaters operating by direct heat transfer.
<input type="checkbox"/>	51. Steam cleaning operations.
<input checked="" type="checkbox"/>	52. Steam leaks.
<input type="checkbox"/>	53. Steam sterilizers.
<input checked="" type="checkbox"/>	54. Steam vents and safety relief valves.
<input type="checkbox"/>	55. Storage tanks, reservoirs, and pumping and handling equipment of any size containing soaps, vegetable oil, grease, animal fat, and nonvolatile aqueous salt solutions, provided appropriate lids and covers are utilized.
<input type="checkbox"/>	56. Storage tanks, vessels, and containers holding or storing liquid substances that will not emit any VOC or HAP. Exemptions for storage tanks containing petroleum liquids or other volatile organic liquids should be based on size limits such as storage tank capacity and vapor pressure of liquids stored and are not appropriate for this list.
<input type="checkbox"/>	57. Such other sources or activities as the Director may determine.
<input type="checkbox"/>	58. Tobacco smoking rooms and areas.
<input checked="" type="checkbox"/>	59. Vents from continuous emissions monitors and other analyzers.

Section 5: Emission Units, Control Devices, and Emission Points

25. Equipment Table
Fill out the Title V Equipment Table and provide it as ATTACHMENT D .
26. Emission Units
For each emission unit listed in the Title V Equipment Table , fill out and provide an Emission Unit Form as ATTACHMENT E .
For each emission unit not in compliance with an applicable requirement, fill out a Schedule of Compliance Form as ATTACHMENT F .
27. Control Devices
For each control device listed in the Title V Equipment Table , fill out and provide an Air Pollution Control Device Form as ATTACHMENT G .
For any control device that is required on an emission unit in order to meet a standard or limitation for which the potential pre-control device emissions of an applicable regulated air pollutant is greater than or equal to the Title V Major Source Threshold Level, refer to the Compliance Assurance Monitoring (CAM) Form(s) for CAM applicability. Fill out and provide these forms, if applicable, for each Pollutant Specific Emission Unit (PSEU) as ATTACHMENT H .

Section 6: Certification of Information

28. Certification of Truth, Accuracy and Completeness and Certification of Compliance

Note: This Certification must be signed by a responsible official. The original, signed in blue ink, must be submitted with the application. Applications without an original signed certification will be considered as incomplete.

a. Certification of Truth, Accuracy and Completeness

I certify that I am a responsible official (as defined at 45CSR§30-2.38) and am accordingly authorized to make this submission on behalf of the owners or operators of the source described in this document and its attachments. I certify under penalty of law that I have personally examined and am familiar with the statements and 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 are to the best of my knowledge and belief true, accurate, and complete. I am aware that there are significant penalties for submitting false statements and information or omitting required statements and information, including the possibility of fine and/or imprisonment.

b. Compliance Certification

Except for requirements identified in the Title V Application for which compliance is not achieved, I, the undersigned hereby certify that, based on information and belief formed after reasonable inquiry, all air contaminant sources identified in this application are in compliance with all applicable requirements.

Responsible official (type or print)

Name: William E. Greenfield

Title: SCCP Production leader

Responsible official's signature:

Signature: William E Greenfield Signature Date: 5/4/16
 (Must be signed and dated in blue ink)

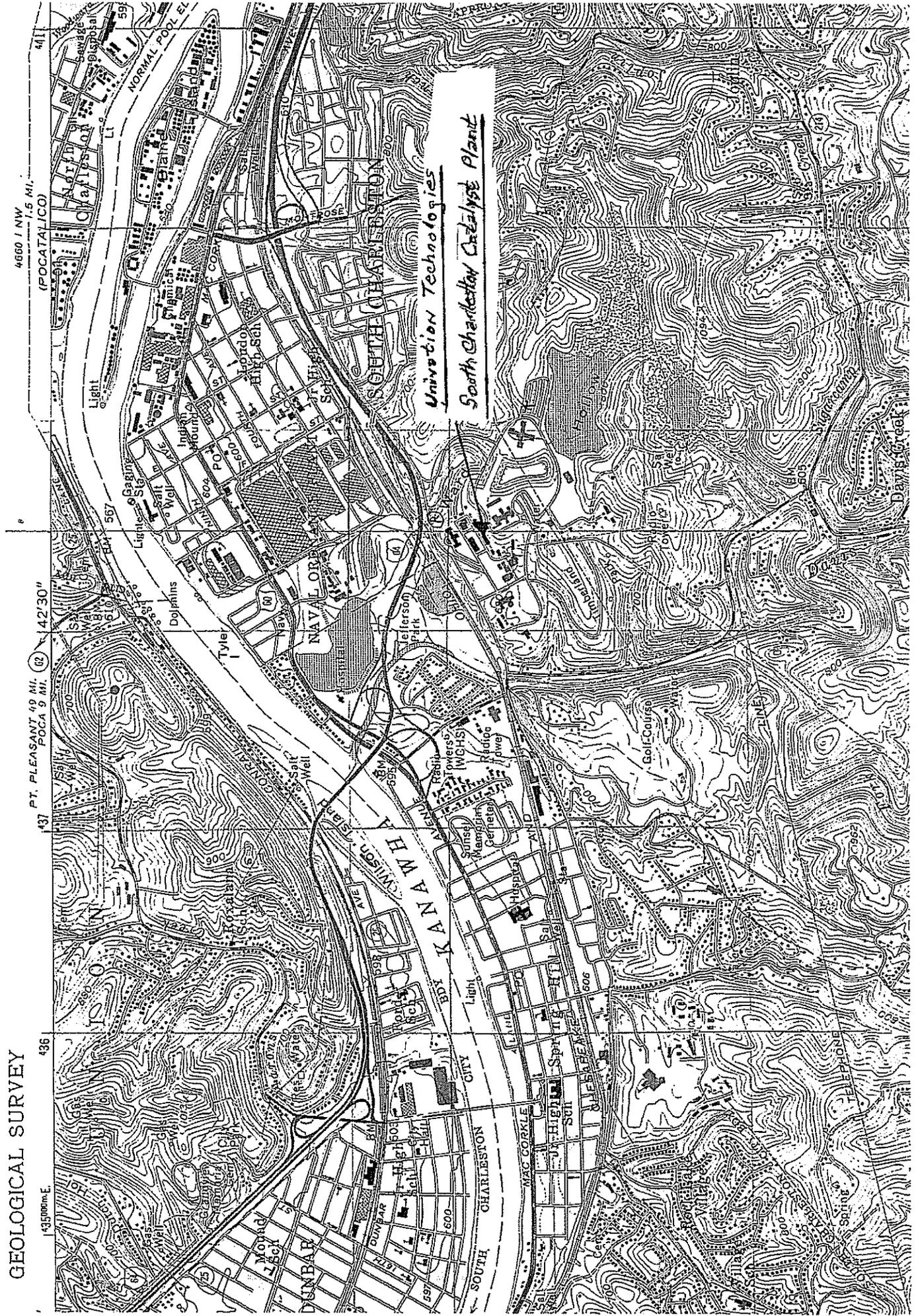
Note: Please check all applicable attachments included with this permit application:

<input checked="" type="checkbox"/>	ATTACHMENT A: Area Map
<input checked="" type="checkbox"/>	ATTACHMENT B: Plot Plan(s)
<input checked="" type="checkbox"/>	ATTACHMENT C: Process Flow Diagram(s)
<input checked="" type="checkbox"/>	ATTACHMENT D: Equipment Table
<input checked="" type="checkbox"/>	ATTACHMENT E: Emission Unit Form(s)
<input type="checkbox"/>	ATTACHMENT F: Schedule of Compliance Form(s)
<input checked="" type="checkbox"/>	ATTACHMENT G: Air Pollution Control Device Form(s)
<input type="checkbox"/>	ATTACHMENT H: Compliance Assurance Monitoring (CAM) Form(s)

All of the required forms and additional information can be found and downloaded from, the DEP website at www.dep.wv.gov/daq, requested by phone (304) 926-0475, and/or obtained through the mail.

ATTACHMENT H
AREA MAP

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY



4660 1 INCH
(POCATAHICO)

PT. PLEASANT 49 MI. (C)
POCA 9 MI. (C) 42'30"

1450000-E 496

Univision Technologies
South Charleston Catalyst Plant

Attachment C
Process Diagram

UT – South Charleston Catalyst Plant Small Tank Layout

Eq. Id. SP6
Em. Pt. AX6



Eq. Id. SP1
Em. Pt. AX1



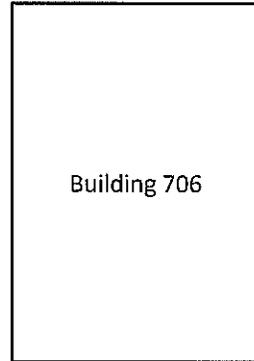
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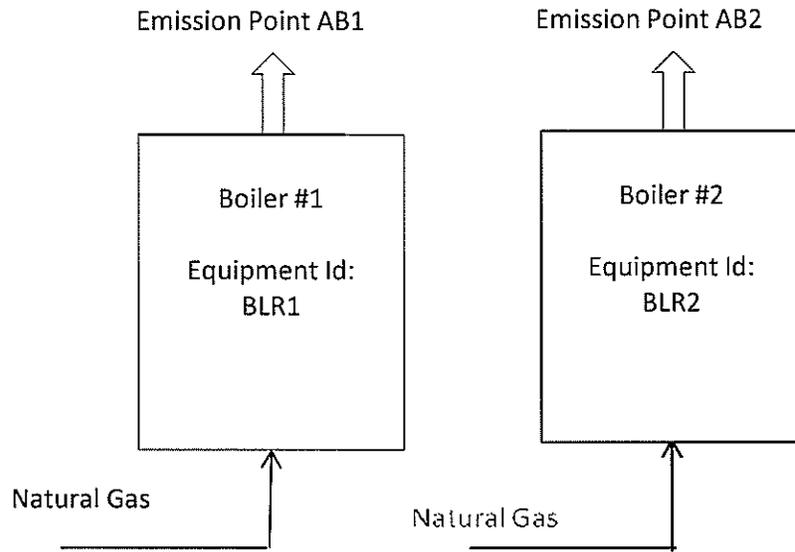


Eq. Id. SP3
Em. Pt. AX3



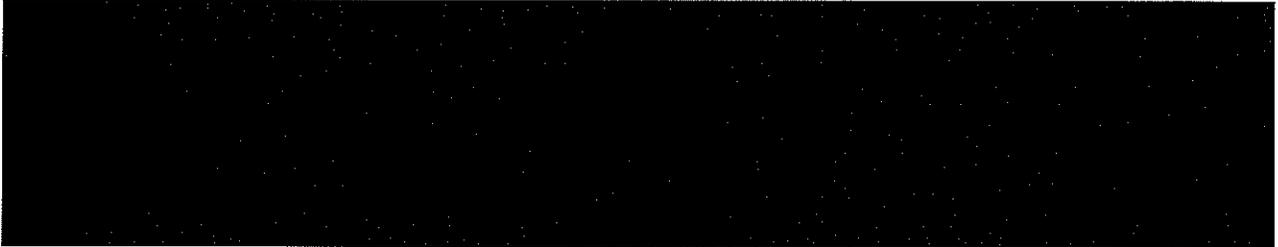
Attachment C
Process Diagram

UT – South Charleston Catalyst Plant Boilers



**Univation Technologies South Charleston Catalyst Plant
Attachment C**

Process Flow Diagrams – OMU2 Process



Redated Copy
Claim of Confidentiality
MAY 05 2016

**Univation Technologies South Charleston Catalyst Plant
Attachment C**

Process Flow Diagrams – OMU3 Process



**Redated Copy
Claim of Confidentiality
MAY 05 2016**

Univation Technologies South Charleston Catalyst Plant

ATTACHMENT D - Title V Equipment Table (includes all emission units at the facility except those designated as insignificant activities in Section 4, Item 24 of the General Forms)					
Emission Point ID ¹	Control Device ¹	Emission Unit ID ¹	Emission Unit Description	Design Capacity	Year Installed
AB1		BLR1	Boiler #1	1.26 MMBtu/hr	2012
AB2		BLR2	Boiler #2	1.26 MMBtu/hr	2012
AT3		C385	Oil Pot	30	1991
AF4	L15	E325	Product Separation and Recovery Condenser – vents to flare	not applicable	2009
AF4 or AT3	L15 or none	E400	Reactor Recovery Condenser – vents to seal oil pot (C385) or to flare	not applicable	1991
AF4 or EJ01	L15 or none	J01	J01 Reactor	500 gallons	1959
AT7	K07	K02	Dumping Bag Station	Not Applicable	1991
AF4	L15	KO4	K04 Tank Solvent 1	1,500 gallons	1991
AF4 or AT3	L15 or none	K05	K05 Reactor (vents to air or to flare via Condenser E400)	Not Applicable	1991
AF4	L15	K06	K06 Product Separator and Solvent Recovery (vents to flare via Condenser E325)	Not Applicable	2009
AF4	L15	K08	K08 Hold Tank	2,000 gallons	1991
AF4	L15	K18	K18 Tank - Solvent 3	250 gallons	2009
AF4	L15	K20	K20 Tank - Solvent 1	120 gallons	2010
ATX		KXX	Containers	not applicable	NA
AF4		L15	Flare	2 million Btus/hr	1991
AX1		SP1	SP1 Tank – Solvent 2	2,400 gallons	1966
AX2		SP2	SP2 Tank - Solvent 2	2,400 gallons	1966
AX3		SP3	SP3 Tank - Propylene Glycol/Water	970 gallons	1976
AX6		SP6	SP6 Tank - Solvent 2	5,500 gallons	1983
AXA		SPA	SPA Tank (out of service)	6,500 gallons	1980
Not Applicable		BHVAC	Miscellaneous Building Air Conditioners	Units with less than 50 lbs of refrigerant	Not Applicable
Not Applicable		MRU	Industrial Refrigeration Unit (Refrigerant HFC 404A)	Unit with more than 50 lbs of refrigerant	2013

ATTACHMENT E - Emission Unit Form

Emission Unit Description

Emission unit ID number: BLR1	Emission unit name: Boiler #1	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):

Natural gas fired boiler to provide steam to facility operations.

Manufacturer: Fulton	Model number: ICX-30	Serial number: Boiler # 695KK National Board # 114623 State Serial # W-20062-W
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Construction date: November 2012	Installation date: Same as construction date	Modification date(s): MM/DD/YYYY
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, is it? <input checked="" type="checkbox"/> Indirect Fired <input type="checkbox"/> Direct Fired
--	---

Maximum design heat input and/or maximum horsepower rating: 1.260 MMBtu/hr	Type and Btu/hr rating of burners: Natural Gas - one
--	--

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Natural gas
 Maximum hourly fuel rate: 1,260 scf/hr @ 1,000 Btu/scf
 Annual fuel usage: 11,037,600 @ 1,000 Btu/scf

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value
Natural Gas	none	none	950 – 1,250 Btu/scf

Emissions Data		
Criteria Pollutants	Potential Emissions	
	PPH	TPY
Carbon Monoxide (CO)	0.10	0.45
Nitrogen Oxides (NO _x)	0.12	0.54
Lead (Pb)	0	0
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)	0.01	0.04
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	0.01	0.03
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Includes but not limited to formaldehyde and hexane	0.01	0.01
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
Carbon Dioxide	121	530
Methane	0.01	0.01
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>USEPA Emission Factors (AP-42) for criteria pollutants and HAPS. USEPA Greenhouse Gas Reporting Tool Worksheet for carbon dioxide and methane.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

WVDEP §45-2-3.1. No person shall cause, suffer, allow or permit emission of smoke and/or particulate matter into the open air from any fuel burning unit which is greater than ten (10) percent opacity based on a six minute block average.

- per §45-2-11.1. Any fuel burning unit(s) having a heat input under ten (10) million B.T.U.'s per hour will be exempt from sections 4, 5, 6, 8 and 9 (of Regulation 2).

- per 45-2A.3.1.c. The owner or operator of a fuel burning unit(s) which combusts only natural gas shall be exempt from sections 5 (testing) and 6 (visible emissions monitoring plan) (of Regulation 2A).

Exemption: WVDEP §45-10-10.1. Any fuel burning units having a design heat input under ten (10) million BTU's per hour will be exempt from section 3 and sections 6 through 8 (of Regulation 10). Therefore Regulation 10 does not apply.

X Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

The method used to demonstration of compliance with §45-2-3.1 will be limiting fuel consumption to natural gas.

Are you in compliance with all applicable requirements for this emission unit? X Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description

Emission unit ID number: BLR2	Emission unit name: Boiler #2	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):

Natural gas fired boiler to provide steam to facility operations.

Manufacturer: Fulton	Model number: ICX-30	Serial number: Boiler # 696KK National Board # 114623 State Serial # W-20063-W
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Construction date: November 2012	Installation date: Same as construction date	Modification date(s): MM/DD/YYYY
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, is it? <input checked="" type="checkbox"/> Indirect Fired <input type="checkbox"/> Direct Fired
--	---

Maximum design heat input and/or maximum horsepower rating: 1.260 MMBtu/hr	Type and Btu/hr rating of burners: Natural Gas - one
--	--

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Natural gas
 Maximum hourly fuel rate: 1,260 scf/hr @ 1,000 Btu/scf
 Annual fuel usage: 11,037,600 @ 1,000 Btu/scf

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value
Natural Gas	none	none	950 – 1,250 Btu/scf

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions	
	PPH	TPY
Carbon Monoxide (CO)	0.10	0.45
Nitrogen Oxides (NO _x)	0.12	0.54
Lead (Pb)	0	0
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)	0.01	0.04
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	0.01	0.03
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Includes but not limited to formaldehyde and hexane	0.01	0.01
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
Carbon Dioxide	121	530
Methane	0.01	0.01
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>USEPA Emission Factors (AP-42) for criteria pollutants and HAPS. USEPA Greenhouse Gas Reporting Tool Worksheet for carbon dioxide and methane.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

WVDEP §45-2-3.1. No person shall cause, suffer, allow or permit emission of smoke and/or particulate matter into the open air from any fuel burning unit which is greater than ten (10) percent opacity based on a six minute block average.

- per §45-2-11.1. Any fuel burning unit(s) having a heat input under ten (10) million B.T.U.'s per hour will be exempt from sections 4, 5, 6, 8 and 9 (of Regulation 2).

- per 45-2A.3.1.c. The owner or operator of a fuel burning unit(s) which combusts only natural gas shall be exempt from sections 5 (testing) and 6 (visible emissions monitoring plan) (of Regulation 2A).

Exemption: WVDEP §45-10-10.1. Any fuel burning units having a design heat input under ten (10) million BTU's per hour will be exempt from section 3 and sections 6 through 8 (of Regulation 10). Therefore Regulation 10 does not apply.

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

The method used to demonstration of compliance with WVDAQ Regulation 2 Section §3.1 will be limiting fuel consumption to natural gas.

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form*Emission Unit Description: OMU3 Process*

Emission unit ID number: J01	Emission unit name: J01 Reactor	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Raw materials are fed on batch basis to make final product mixture on batch basis.

Manufacturer:	Model number:	Serial number:
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Construction date: 1959	Installation date: 1959	Modification date(s): not applicable
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
500 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput: ██████████	Maximum Operating Schedule: 24 hrs/day, 365 days/yr
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___Yes <u>X</u> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	0.41 (vents to flare)	0.045 (vents to flare)
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
2,2,4-Trimethylpentane	0.24 (vents to flare)	0.04 (vents to flare)
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Engineering calculations.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-B UT OMU3 Applicable Reqts-MRR

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For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-B UT OMU3 Applicable Reqts-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

<i>Emission Unit Description:</i>			
Emission unit ID number: K02	Emission unit name: Dumping Bag Station	List any control devices associated with this emission unit: K07 – fabric filter	
Provide a description of the emission unit (type, method of operation, design parameters, etc.): Batch operation to receive solid raw material from bags			
Manufacturer:	Model number:	Serial number:	
Construction date: 1991	Installation date: 1991	Modification date(s): not applicable	
Design Capacity (examples: furnaces - tons/hr, tanks - gallons): Not applicable			
Maximum Hourly Throughput: [REDACTED]	Maximum Annual Throughput: [REDACTED]	Maximum Operating Schedule: [REDACTED]	
<i>Fuel Usage Data (fill out all applicable fields)</i>			
Does this emission unit combust fuel? ___Yes ___X No		If yes, is it? ___ Indirect Fired ___ Direct Fired	
Maximum design heat input and/or maximum horsepower rating:		Type and Btu/hr rating of burners:	
List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.			
Describe each fuel expected to be used during the term of the permit.			
Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point AT7)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)	0.17	0.74
Total Particulate Matter (TSP)	0.17	0.74
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)		
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Based on engineering calculation.

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (*Note: Title V permit condition numbers alone are not the underlying applicable requirements*). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR

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ATTACHMENT E - Emission Unit Form

Emission Unit Description:

Emission unit ID number: K04	Emission unit name: K04 Tank Solvent 1	List any control devices associated with this emission unit: L15 (flare)
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Tank used to store raw material.

Manufacturer:	Model number:	Serial number:
Construction date: 1991	Installation date: 1991	Modification date(s): not applicable

Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
1,500 gallons

Maximum Hourly Throughput: [REDACTED]	Maximum Annual Throughput: [REDACTED]	Maximum Operating Schedule: [REDACTED]
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___Yes ___X No	If yes, is it? ___ Indirect Fired ___ Direct Fired
---	--

Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
--	---

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (see Header Vacuum Pump and Flare Emission Unit Forms)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)		
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene		
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Based on batch process vent equations required by MON MACT.

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (*Note: Title V permit condition numbers alone are not the underlying applicable requirements*). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR

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For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 Process

Emission unit ID number: K06/E325	Emission unit name: K06 Product Separation & Solvent Recovery	List any control devices associated with this emission unit: L15 - Flare
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Continuous operation

Manufacturer:	Model number:	Serial number:
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Construction date: 1991	Installation date: 1991	Modification date(s): 1991
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule: 24 hrs/day 365 days/yr
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes <u> X </u> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
--	--

Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
--	---

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (see Flare Emission Unit Form)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	see Flare Emission Unit Form	see Flare Emission Unit Form
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene	see Flare Emission Unit Form	see Flare Emission Unit Form
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Potential VOC/HAP emissions were calculated using standard engineering methods for chemical manufacturing operations (e.g. assuming saturated vent conditions and accounting for transfers into and out of vessels).

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

KO6 vent gas is routed to condenser (Equipment ID E-325) for recovery of solvent. The condenser vent gas is routed to a flare for control of VOC/HAP emissions.

The condenser vent gas is a Group 2 stream per 40 CFR 63 Subpart FFFF.

The condenser (E-325) shall be operated at all times when hazardous air pollutants emissions are vented to the device except when the TRE index is greater than 5.0 and operation of E-325 is not required to meet the MON requirements (ie during process standby). [45CSR34, 40 C.F.R. § 63.993 (a) (2), 45CSR13, R13-2631, 4.1.10. (E-325)]

See also Attachment I-A UT OMU2 Applicable Reqt-MRR

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For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 Process

Emission unit ID number: K05/E-400	Emission unit name: K05 Reactor/ E400 Condenser	List any control devices associated with this emission unit: Flare (L15) or none
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Raw materials are fed on batch basis to make final product mixture on batch basis.

Manufacturer:	Model number:	Serial number:
Construction date: 1991	Installation date: 1991	Modification date(s): not applicable

Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
1,000 gallons

Maximum Hourly Throughput: [REDACTED]	Maximum Annual Throughput: [REDACTED]	Maximum Operating Schedule: [REDACTED]
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes <u> X </u> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
--	--

Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
--	---

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

Emissions Data

Criteria Pollutants	Potential Emissions (see also Flare Emission Unit Form)	
	PPH	TPY

Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	0.44 (Emission Point AT3) see Flare Emission Unit Form	0.47 (Emission Point AT3) see Flare Emission Unit Form
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene	0.44 (Emission Point AT3) see also Flare Emission Unit Form	0.47 (Emission Point AT3) see also Flare Emission Unit Form
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Based on batch process vent equations required by MON MACT.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or **construction permit** with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

- During depressurization batch process steps, VOC emissions are vent directly to the air. The following applies

The VOC and toluene (HAP) emissions from reactor K05 through emission point AT3 shall not exceed 0.44 pounds per hour and 932 pounds per year. [45CSR13, Permit No. R13-2631 - (Condition 4.1.12.) (K05)]

See also Attachment I-A UT OMU2 Applicable Reqt-MRR

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For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

For the purpose of demonstrating compliance with the VOC/Toluene emission limits, monitor and record the number of batches of product produced, whether each batch was a standard or non-standard batch and other data necessary to determine the amount of VOCs and HAPs emitted. [45CSR13, Permit No. R13-2631 - (Condition 4.2.5.) (K05)]

See also Attachment I-A UT OMU2 Applicable Reqt-MRR.

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 Process

Emission unit ID number: K08	Emission unit name: K08 Hold Tank	List any control devices associated with this emission unit: L15 Flare
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Process storage tank.

Manufacturer:	Model number:	Serial number:
Construction date: 1991	Installation date: 1991	Modification date(s): not applicable

Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 2,000 gallons

Maximum Hourly Throughput: see reactor (K05) emission unit form	Maximum Annual Throughput: see reactor (K05) emission unit form	Maximum Operating Schedule: 24 hrs/day 365 days/yr
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes ___ <input checked="" type="checkbox"/> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
---	--

Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
--	---

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (see Flare Emission Unit Forms)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	see Flare Emission Unit Form	see Flare Emission Unit Form
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene	see Flare Emission Unit Forms	see Flare Emission Unit Forms
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Based on batch process vent equations required by MON MACT.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

For the purpose of demonstrating compliance with the VOC/Toluene emission limits, monitor and record of the number of batches of product produced, whether each batch was a standard or non-standard batch and other data necessary to determine the amount of VOCs and HAPs emitted. [45CSR13, Permit No. R13-2631 - (Condition 4.2.5.) (K05)]

See also Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 & OMU3 Processes

Emission unit ID number: K18	Emission unit name: K18 Tank – Solvent 3	List any control devices associated with this emission unit: L15 - Flare
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Fixed roof tank.

Manufacturer:	Model number:	Serial number:
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Construction date: 2009	Installation date: 2009	Modification date(s): not applicable
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 250 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes <u>X</u> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC) – OMU2	see Flare Emission Unit Form	see Flare Emission Unit Form
Volatile Organic Compounds (VOC) – OMU3	0.22 (vents to flare)	0.24 (vents to flare)
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene & 2,2,4-Trimethylpentane – OMU2	see Flare Emission Unit Form	see Flare Emission Unit Form
2,2,4-Trimethylpentane - OMU3	0.22 (vents to flare)	0.24 (vents to flare)
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>VOC emissions were calculated using standard engineering methods for chemical manufacturing operations (e.g. assuming saturated vent conditions and accounting for transfers into and out of vessels).</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR & Attachment I-B UT OMU3 Applicable Reqts-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-A UT OMU2 Applicable Reqt-MRR & Attachment I-B UT OMU3 Applicable Reqts-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 Process

Emission unit ID number: K20	Emission unit name: K20 Tank – Solvent 1	List any control devices associated with this emission unit: L15 - Flare
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Process tank used to store solvent for feeding to process reactor.

Manufacturer:	Model number:	Serial number:
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Construction date: 2010	Installation date: 2010	Modification date(s): not applicable
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 120 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___Yes ___X No	If yes, is it? ___ Indirect Fired ___ Direct Fired
Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:

List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (see Header Vacuum Pump and Flare Emission Unit Forms)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	see Flare Emission Unit Forms	see Flare Emission Unit Forms
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene	see Flare Emission Unit Forms	see Flare Emission Unit Forms
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Based on batch process vent equations required by MON MACT.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 & OMU3 Processes

Emission unit ID number: KXX	Emission unit name: Containers	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Used for management of raw materials, products and wastes

Manufacturer: not applicable	Model number: not applicable	Serial number: not applicable
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Construction date: not applicable	Installation date: not applicable	Modification date(s): not applicable
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Typical volume approximately 55 to 250 gallons

Maximum Hourly Throughput: not applicable	Maximum Annual Throughput: not applicable	Maximum Operating Schedule: 24 hrs/day 365 days/yr
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___Yes ___X No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point ATX)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	0.29 (OMU2 Process) <0.1 (OMU3 Process to flare)	0.194 (OMU2 Process) 0.11 (OMU3 Process to flare)
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Toluene & 2,2,4-Trimethylpentane (OMU2 Process)	0.29	0.194
2,2,4-Trimethylpentane (OMU2 Process)	<0.1 (OMU3 Process to flare)	0.11 (OMU3 Process to flare)
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Potential VOC/HAP emissions were calculated using standard engineering methods for chemical manufacturing operations (e.g. assuming saturated vent conditions and accounting for transfers into and out of vessels) and batch process vent equations required by MON MACT.

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

The VOC and total HAP emissions from containers, designated as KXX through emission point ATX shall not exceed 0.29 pounds per hour and 387 pounds per year. [45CSR13, Permit No. R13-2631 - (Condition 4.1.14.) (KXX)]

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

For the purpose of demonstrating compliance, maintain records of Solvent 1 and Solvent transfers that result in container emissions directly to the air. [45CSR13, Permit No. R13-2631, 4.2.7., (KXX)]

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 & OM3 Processes

Emission unit ID number: SP1	Emission unit name: SP1 Tank – Solvent 2	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Fixed roof storage tank.

Manufacturer:	Model number:	Serial number:
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Construction date: 1966	Installation date: 1966	Modification date(s): 1966
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 2,400 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___Yes ___X No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

Emissions Data

Criteria Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point AX1/AX2)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	not applicable	0.012 (combined emissions for AX1 and AX2)
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Tank emissions were calculated using equations from US EPA AP-42.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

The VOC emissions (combined) from tank SP1 through emission point AX1 and tank SP2 through emission point AX2 shall not exceed 24 pounds per year. [45CSR13, Permit No. R13-2631 - (Condition 4.1.13.) (SP1, SP2)]

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

For the purpose of demonstrating compliance, maintain a record of the quantity of material received and transferred to Tanks SP1 and SP2. [45CSR13, Permit No. R13-2631, 4.2.6., (SP1, SP2)]

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 & OMU3 Processes

Emission unit ID number: SP2	Emission unit name: SP2 Tank – Solvent 2	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Fixed roof storage tank.

Manufacturer:	Model number:	Serial number:
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Construction date: 1966	Installation date: 1966	Modification date(s): 1966
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 2,400 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes ___ <input checked="" type="checkbox"/> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

Group 3 of 3: Title V Permit Renewal Application – MDP

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point AX1/AX2)	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	not applicable	0.012 (combined emissions for AX1 and AX2)
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Tank emissions were calculated using equations from US EPA AP-42.

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

The VOC emissions (combined) from tank SP1 through emission point AX1 and tank SP2 through emission point AX2 shall not exceed 24 pounds per year. [45CSR13, Permit No. R13-2631 - (Condition 4.1.13.) (SP1, SP2)]

Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

For the purpose of demonstrating compliance, maintain a record of the quantity of material received and transferred to Tanks SP1 and SP2. [45CSR13, Permit No. R13-2631, 4.2.6., (SP1, SP2)]

Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as **ATTACHMENT F**.

ATTACHMENT E - Emission Unit Form

Emission Unit Description: OMU2 & OM3 Processes

Emission unit ID number: SP6	Emission unit name: SP6 Tank – Solvent 2	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):
Fixed roof storage tank.

Manufacturer:	Model number:	Serial number:
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Construction date: 1966	Installation date: 1966	Modification date(s): 1966
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):
Vessel volume approximately 5,500 gallons

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule:
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? ___ Yes ___ <input checked="" type="checkbox"/> No	If yes, is it? ___ Indirect Fired ___ Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners:
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions	
	PPH	TPY
Carbon Monoxide (CO)		
Nitrogen Oxides (NO _x)		
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)		
Total Particulate Matter (TSP)		
Sulfur Dioxide (SO ₂)		
Volatile Organic Compounds (VOC)	not applicable	0.012
Hazardous Air Pollutants	Potential Emissions	
	PPH	TPY
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY

List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).

Tank emissions were calculated using equations from US EPA AP-42.

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or construction permit with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

None

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

None

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the Schedule of Compliance Form as ATTACHMENT F.

ATTACHMENT E - Emission Unit Form

Emission Unit Description

Emission unit ID number: L15	Emission unit name: Flare	List any control devices associated with this emission unit:
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Provide a description of the emission unit (type, method of operation, design parameters, etc.):

Continuously operated flare to control volatile organic compound and hazardous air pollutant emissions from OMU process equipment vents.

Manufacturer: John Zinc	Model number: EEF-U-2	Serial number:
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Construction date: 1994	Installation date: 1994	Modification date(s): not applicable
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Design Capacity (examples: furnaces - tons/hr, tanks - gallons):

Maximum design heat input approximately 2 million Btus/hr. VOC loading to flare approximately 4.0 lbs/hr. Total combustibles to flare approximately 162 scf/hr. Total flow to flare approximately 965 scf/hr.

Maximum Hourly Throughput:	Maximum Annual Throughput:	Maximum Operating Schedule: 24 hrs/day, 365 days/yr
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Fuel Usage Data (fill out all applicable fields)

Does this emission unit combust fuel? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, is it? <input type="checkbox"/> Indirect Fired <input checked="" type="checkbox"/> Direct Fired
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Maximum design heat input and/or maximum horsepower rating:	Type and Btu/hr rating of burners: Pilot – 75,000 Btus/hr
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List the primary fuel type(s) and if applicable, the secondary fuel type(s). For each fuel type listed, provide the maximum hourly and annual fuel usage for each.

Natural gas

Describe each fuel expected to be used during the term of the permit.

Fuel Type	Max. Sulfur Content	Max. Ash Content	BTU Value
Natural gas	<0.01%	0	1,035 to 1,250 Btu/scf typical

<i>Emissions Data</i>		
Criteria Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point AF4)	
	PPH	TPY
Carbon Monoxide (CO)	0.74	3.24
Nitrogen Oxides (NO _x)	0.14	0.60
Lead (Pb)		
Particulate Matter (PM _{2.5})		
Particulate Matter (PM ₁₀)	0.02	0.07
Total Particulate Matter (TSP)	0.02	0.07
Sulfur Dioxide (SO ₂)	0.01	0.01
Volatile Organic Compounds (VOC)	0.08	0.19
Hazardous Air Pollutants	Potential Emissions (from Permit R13-2631A – Emission Point AF4)	
	PPH	TPY
Toluene/2,2,4-Trimethylpentane (OMU2 & OMU3 Process)	0.08	0.19
2,2,4-Trimethyl pentane (OMU3 Processes)	0.3 (prior to flare)	0.5 (prior to flare)
Regulated Pollutants other than Criteria and HAP	Potential Emissions	
	PPH	TPY
<p>List the method(s) used to calculate the potential emissions (include dates of any stack tests conducted, versions of software used, source and dates of emission factors, etc.).</p> <p>Engineering calculations including batch process vent equations required by MON MACT.</p>		

Applicable Requirements

List all applicable requirements for this emission unit. For each applicable requirement, include the underlying rule/regulation citation and/or **construction permit** with the condition number. (Note: Title V permit condition numbers alone are not the underlying applicable requirements). If an emission limit is calculated based on the type of source and design capacity or if a standard is based on a design parameter, this information should also be included.

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Permit Shield

For all applicable requirements listed above, provide monitoring/testing/recordkeeping/reporting which shall be used to demonstrate compliance. If the method is based on a permit or rule, include the condition number or citation. (Note: Each requirement listed above must have an associated method of demonstrating compliance. If there is not already a required method in place, then a method must be proposed.)

See Attachment I-A UT OMU2 Applicable Reqt-MRR

Are you in compliance with all applicable requirements for this emission unit? Yes No

If no, complete the **Schedule of Compliance Form** as ATTACHMENT F.

**Univation Technologies South Charleston Catalyst Plant
Attachment F – Compliance Plan**

Not Applicable

ATTACHMENT G - Air Pollution Control Device Form		
Control device ID number: K07	List all emission units associated with this control device. K02	
Manufacturer: Hardy Systems Corp.	Model number: BS-3	Installation date: 1991
Type of Air Pollution Control Device:		
<input checked="" type="checkbox"/> Baghouse/Fabric Filter <input type="checkbox"/> Venturi Scrubber <input type="checkbox"/> Multiclone <input type="checkbox"/> Carbon Bed Adsorber <input type="checkbox"/> Packed Tower Scrubber <input type="checkbox"/> Single Cyclone <input type="checkbox"/> Carbon Drum(s) <input type="checkbox"/> Other Wet Scrubber <input type="checkbox"/> Cyclone Bank <input type="checkbox"/> Catalytic Incinerator <input type="checkbox"/> Condenser <input type="checkbox"/> Settling Chamber <input type="checkbox"/> Thermal Incinerator <input type="checkbox"/> Flare <input type="checkbox"/> Other (describe) _____ <input type="checkbox"/> Wet Plate Electrostatic Precipitator <input type="checkbox"/> Dry Plate Electrostatic Precipitator		
List the pollutants for which this device is intended to control and the capture and control efficiencies.		
Pollutant	Capture Efficiency	Control Efficiency
Particulate Matter		80%
Explain the characteristic design parameters of this control device (flow rates, pressure drops, number of bags, size, temperatures, etc.).		
Flow rate approximately 1,112 acfm @ 77°F and 14.7 psia. Filter contains 15 bags with a total cloth area of 68 square feet. Pulse jet is used to clean bags. Pressure drop across filter is 1 to inches H ₂ O.		
Is this device subject to the CAM requirements of 40 C.F.R. 64? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
If Yes, Complete ATTACHMENT H If No, Provide justification. Uncontrolled regulated pollutant emission rate is less that threshold amount.		
Describe the parameters monitored and/or methods used to indicate performance of this control device.		
If visible emissions are noted, bags are replaced.		

ATTACHMENT G - Air Pollution Control Device Form		
Control device ID number: L15	List all emission units associated with this control device. K04, K05, K06, K08, K18, K20, J01	
Manufacturer: John Zink	Model number: EEF-U-2	Installation date: 1991
Type of Air Pollution Control Device:		
<input type="checkbox"/> Baghouse/Fabric Filter	<input type="checkbox"/> Venturi Scrubber	<input type="checkbox"/> Multiclone
<input type="checkbox"/> Carbon Bed Adsorber	<input type="checkbox"/> Packed Tower Scrubber	<input type="checkbox"/> Single Cyclone
<input type="checkbox"/> Carbon Drum(s)	<input type="checkbox"/> Other Wet Scrubber	<input type="checkbox"/> Cyclone Bank
<input type="checkbox"/> Catalytic Incinerator	<input type="checkbox"/> Condenser	<input type="checkbox"/> Settling Chamber
<input type="checkbox"/> Thermal Incinerator	<input checked="" type="checkbox"/> Flare	<input type="checkbox"/> Other (describe) _____
<input type="checkbox"/> Wet Plate Electrostatic Precipitator	<input type="checkbox"/> Dry Plate Electrostatic Precipitator	
List the pollutants for which this device is intended to control and the capture and control efficiencies.		
Pollutant	Capture Efficiency	Control Efficiency
Volatile Organic Compounds (includes the following HAPS Toluene and 2,2,4 Trimethylpentane)	not applicable	greater than 98%
Explain the characteristic design parameters of this control device (flow rates, pressure drops, number of bags, size, temperatures, etc.).		
Presence of flare flame is continuously monitoring and recorded.		
Is this device subject to the CAM requirements of 40 C.F.R. 64? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
If Yes, Complete ATTACHMENT H		
If No, Provide justification. The OMU2 process vents routed to the flare are covered by 40 CFR 63 Subpart FFFF, National Emissions Standards for Control of Hazardous Air Pollutants from Miscellaneous Organic Chemical Manufacturing Units. OMU3 pollutant specific emission units routed to the flare have pre-control emissions less than Title V major source levels.		
Describe the parameters monitored and/or methods used to indicate performance of this control device.		
The presence of either a pilot light or flare flame while VOCs and HAPs are present in the process vent header that is continuously monitored and recorded.		

ATTACHMENT H - Compliance Assurance Monitoring (CAM) Plan Form

For definitions and information about the CAM rule, please refer to 40 CFR Part 64. Additional information (including guidance documents) may also be found at <http://www.epa.gov/ttn/emc/cam.html>

CAM APPLICABILITY DETERMINATION

1) Does the facility have a PSEU (Pollutant-Specific Emissions Unit considered separately with respect to EACH regulated air pollutant) that is subject to CAM (40 CFR Part 64), which must be addressed in this CAM plan submittal? To determine applicability, a PSEU must meet all of the following criteria (*If No, then the remainder of this form need not be completed*): YES NO

- a. The PSEU is located at a major source that is required to obtain a Title V permit;
- b. The PSEU is subject to an emission limitation or standard for the applicable regulated air pollutant that is NOT exempt;

LIST OF EXEMPT EMISSION LIMITATIONS OR STANDARDS:

- NSPS (40 CFR Part 60) or NESHAP (40 CFR Parts 61 and 63) proposed after 11/15/1990.
 - Stratospheric Ozone Protection Requirements.
 - Acid Rain Program Requirements.
 - Emission Limitations or Standards for which a WVDEP Division of Air Quality Title V permit specifies a continuous compliance determination method, as defined in 40 CFR §64.1.
 - An emission cap that meets the requirements specified in 40 CFR §70.4(b)(12).
- c. The PSEU uses an add-on control device (as defined in 40 CFR §64.1) to achieve compliance with an emission limitation or standard;
 - d. The PSEU has potential pre-control device emissions of the applicable regulated air pollutant that are equal to or greater than the Title V Major Source Threshold Levels; AND
 - e. The PSEU is NOT an exempt backup utility power emissions unit that is municipally-owned.

BASIS OF CAM SUBMITTAL

2) Mark the appropriate box below as to why this CAM plan is being submitted as part of an application for a Title V permit:

RENEWAL APPLICATION. ALL PSEUs for which a CAM plan has NOT yet been approved need to be addressed in this CAM plan submittal.

INITIAL APPLICATION (submitted after 4/20/98). ONLY large PSEUs (i. e., PSEUs with potential post-control device emissions of an applicable regulated air pollutant that are equal to or greater than Major Source Threshold Levels) need to be addressed in this CAM plan submittal.

SIGNIFICANT MODIFICATION TO LARGE PSEUs. ONLY large PSEUs being modified after 4/20/98 need to be addressed in this cam plan submittal. For large PSEUs with an approved CAM plan, Only address the appropriate monitoring requirements affected by the significant modification.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Emission Units

Emission Unit ID	Emission Point ID	Emission Unit Description	Year Installed	Design Capacity	Control Device
C385	AT3	Oil Pot	1991	30	
E325	AF4	Product Separation and Recovery Condenser – vents to flare	2009	not applicable	L15
E400	AF4 or AT3	Reactor Recovery Condenser – vents to seal pot (C385) or to flare	1991	not applicable	L15 or none
J01	AF4 or EJ01	J01 Reactor	1959	500 gallons	L15 or none
K02	AT7	Dumping Bag Station	1991	not applicable	K07
K04	AF4	K04 Tank - Solvent 1	1991	1,500 gallons	L15 or none
K05	AF4 or AT3	K05 Reactor (vents to air or to flare via Condenser E-400)	1991	not applicable	L15 or none
K06	AF4	K06 Product Separator and Solvent Recovery (vents to flare via Condenser E-325)	2009	not applicable	L15
K08	AF4	K08 Hold Tank	1991	2,000 gallons	L15 or none
K18	AF4	K18 Tank – Solvent 3	2009	250 gallons	L15
K20	AF4	K20 Tank - Solvent 1	2010	120 gallons	L15
KXX	ATX	Containers	not applicable	not applicable	
L15	AF4	Flare	1991	2 MMBtus/hr	
SP1	AX1	SP1 Tank – Solvent 2	1966	2,400 gallons	
SP2	AX2	SP2 Tank – Solvent 2	1966	2,400 gallons	
SP6	AX6	SP6 Tank – Solvent 2	1983	5,500 gallons	
Control Devices					
L15	AF4	Flare	1991	2 million Btus/hr	
K07	AT7	C13W Dump Station Filter or Hardy System Fabric Filter Baghouse Model: BS-3 Control Efficiency: 80%	1991	not applicable	

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

1.0 Source-Specific Requirements [Organo Metallic Compound Production Unit (OMU2) Process]

4.1. Limitations and Standards

4.1.1. The emissions from the flare, designated as L15, venting through emission point AF4 shall not exceed the limits shown in the following table:

4.1.1. EMISSIONS FROM FLARE L15		
Pollutant	Hourly	Annual*
	lb/hr	TPY
PM ₁₀	0.02	0.07
PM	0.02	0.07
SO ₂	0.01	0.01
NO _x	0.14	0.60
CO	0.74	3.24
VOCs	0.08	0.19
Toluene	0.08	0.19

*Annual emissions are based on operating 8760 hours per year.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.1.) Compliance with this streamlined PM limit assures compliance with 45CSR§6-4.1 (L15)]

4.1.2. The flare, designated as L15, shall be operated continuously when the organo-metallic production unit #2 (OMU2) is operating and VOCs and HAPs are present in the process header that is routed to the flare.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.2.) (L15)]

4.1.3. The permittee shall maintain minimum net heating value of 200 Btu/scf (7.45 MJ/scm) or greater for gas stream in the flare gas header routed to the flare, designated as L15.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.3.) (L15)]

4.1.4. The permittee shall operate the flare, designated as L15, with a flare gas exit velocity of less than 60 feet per second (18.3 m/sec).

[45CSR13, Permit No. R13-2631 - (Condition 4.1.4.) (L15)]

4.1.5. The permittee shall install, operate, maintain and calibrate a monitoring device (including but not limited to a thermocouple, ultra-violet beam sensor, or infrared sensor) capable of continuously detecting that at least one pilot flame or the flare flame is present for the flare L15.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.5.) (L15)]

4.1.6. The flare L15 shall not emit visible particular matter from emission point AF4 greater than or equal to 20% opacity except for visible particular matter emission less than 40% for a period or periods aggregating no more than 8 minutes per start-up.

[45CSR§6-4.3, 45CSR§6-4.4, 45CSR13, Permit No. R13-2631 - (Condition 4.1.6.) (L15)]

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

- 4.1.7. The permittee shall operate and maintain the bag dumping station, designated as (K02), in such a way that fugitive particular matter is contained and routed to the fabric filter baghouse, designated as (K07).
[45CSR13, Permit No. R13-2631 - (Condition 4.1.7.) (K02, K07)]
- 4.1.8. The fabric filter baghouse, designated as K07, shall not emit visible particulate matter from emission point AT7 greater than 20% opacity except for visible particular matter emission less than 40% for a period or periods aggregating no more than 5 minutes in any 60 minute period.
[45CSR§7-3.1, 45CSR§7-3.2, 45CSR13, Permit No. R13-2631 - (Condition 4.1.8.) (K07)]
- 4.1.9. The particulate matter and PM₁₀ emission emitted from emission point AT7 shall not exceed 0.17 pounds per hour and 0.74 tons per year.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.9.) (K07)]
- 4.1.10. The condenser (E-325) shall be operated at all times when hazardous air pollutants emissions are vented to the device except when the TRE index is greater than 5.0 and operation of E-325 is not required to meet the MON requirements (i.e. during process standby).
[45CSR34, 40 C.F.R. § 63.993 (a) (2), 45CSR13, R13-2631, 4.1.10. (E-325)]
- 4.1.11. Reserved. ~~The VOCs and toluene emissions being emitted from emission point AR9 shall not exceed 0.47 pounds per hour and 34 pounds per year.~~
~~[45CSR13, Permit No. R13-2631 - (Condition 4.1.11.) (K04, K05, K08)]~~ *AR9 Emission point no longer exists.*
- 4.1.12. The VOC and toluene (HAP) emissions from reactor K05 through emission point AT3 shall not exceed 0.44 pounds per hour and 932 pounds per year.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.12.) (K05)]
- 4.1.13. The VOC emissions (combined) from tank SP1 through emission point AX1 and tank SP2 through emission point AX2 shall not exceed 24 pounds per year.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.13.) (SP1, SP2)]
- 4.1.14. The VOC and total HAP emissions from containers, designated as KXX through emission point ATX shall not exceed 0.29 pounds per hour and 387 pounds per year.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.14.) (KXX)]
- 4.1.15. Compliance with all annual emission limits stated in this permit shall be determined using a rolling yearly total. A rolling yearly total shall mean the sum of the emissions by pollutant for the previous twelve (12) consecutive calendar months.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.15.)]
- 4.1.16. To minimize fugitive VOC emissions from process equipment leaks, the permittee shall install and maintain a double seal with a barrier fluid greater than the process fluid, or equivalent design (e.g. diaphragm pumps) on all pumps and agitators in light liquid VOC and/or HAP service associated with the organo-metallic production unit #2.
[45CSR13, Permit No. R13-2631 - (Condition 4.1.16.)]
- 4.1.17. To minimize fugitive emissions from process equipments leaks, the permittee shall conduct pressure testing of the process equipment in accordance with 40 C.F.R. § 63.2480

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

[45CSR13, Permit No. R13-2631 - (Condition 4.1.17.)]

- 4.1.18. The permittee shall calibrate all monitoring or measuring devices required by this permit, except the monitoring device to detect the presence/absence of the flare pilot flame or flare flame, as required in this permit once every 12 months in accordance with the manufacture's specifications. The device used to monitor the presence of the flare pilot light or flare flame shall be checked annually to confirm proper operation. Records of such calibrations, and checking of the flame sensing device shall be maintained in accordance with Section 3.4.2.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.18.)]

- 4.1.19. Operation and Maintenance of Air Pollution Control Equipment. The permittee shall, to the extent practicable, install, maintain, and operate all pollution control equipment (K07 – Filter, L15 - Flare) and associated monitoring equipment in a manner consistent with safety and good air pollution control practices for minimizing emissions, or comply with any more stringent limits set forth in this permit or as set forth by any State rule, Federal regulation, or alternative control plan approved by the Secretary.

[45CSR13, Permit No. R13-2631 - (Condition 4.1.19.) (K07, L15)]

- 4.1.20. The permittee shall comply with applicable operating limits and standards of 40 C.F.R. Part 63 Subpart FFFF. Limits and standards are listed in Table 1 of this attachment.

[45CSR13, R13-2631, Section 4.1.20.]

4.2. Monitoring Requirements

- 4.2.1. For the purpose of demonstrating compliance with 4.1.3, the permittee shall monitor and record, at least once per day when VOCs are present in the flare header vent gas, the natural gas flow rate to the flare. The natural gas flow rate shall be a minimum of 2.5 scfm when VOCs are present in the flare header vent gas. Records of such monitoring shall be maintained in accordance with Condition 3.4.2.

[45CSR13, Permit No. R13-2631 - (Condition 4.2.1.) (L15)]

- 4.2.2. For the purpose of demonstrating compliance with Condition 4.1.4, the process control system shall be equipped with an alarm to signal flare gas header volumetric flow rate that would equate to a velocity of 60 feet per second or higher at the flare tip. The flare gas volumetric flow alarm shall be checked once per year to assure proper operation.

[45CSR13, Permit No. R13-2631 - (Condition 4.2.2.) (L15)]

- 4.2.3. For the purposes of demonstrating compliance with Conditions 4.1.1 and 4.1.2, the permittee shall continuously monitor the presence of either a pilot light or flare flame while VOCs and HAPs are present in the process header that is routed to the flare.

[45CSR13, Permit No. R13-2631 - (Condition 4.2.3.) (L15)]

- 4.2.4. For purposes of demonstrating compliance with 45CSR§6-4.3 and Condition 4.1.6 the permittee shall conduct visible emission checks of each emission point subject to an opacity limit once per month during periods of normal unit operation using 40 C.F.R. 60 Appendix A, Method 22. If during these checks, or at any other time, visible emissions are observed at any emission point and are not immediately corrected, compliance shall be determined by conducting tests in accordance with 40 C.F.R. 60 Appendix A, Method 9 within 48 hours. If the Method 9 test results show the opacity to be greater than the limit, then an evaluation to determine the cause of the exceedance

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

shall be conducted within three (3) days, unless the cause of the exceedance is corrected within 24 hours. If no visible emissions are observed after four consecutive months, visible emission checks shall be conducted each calendar quarter. If any visible emissions are observed during the quarterly emission checks, visible emission checks shall return to being performed each calendar month. Records shall be maintained in accordance with Condition 3.4.2 and shall include all data required by 40 C.F.R. 60 Appendix A, Method 22 or Method 9 test, whichever is appropriate. These records shall include, at a minimum, the date and time of each visible emission check, the visible emissions survey results and, if appropriate, all corrective actions taken.

[45CSR13, Permit No. R13-2631 - (Condition 4.2.4.) (L15)]

- 4.2.5. For the purpose of demonstrating compliance with Conditions 4.1.11 and 4.1.12, the permittee shall monitor and record of the number of batches of product produced, whether each batch was a standard or non-standard batch and other data necessary to determine the amount of VOCs and HAPs emitted.

[45CSR13, Permit No. R13-2631 - (Condition 4.2.5.) (K05)]

- 4.2.6. For the purpose of demonstrating compliance with condition 4.1.13, the permittee shall maintain a record of the quantity of material received and transferred to Tanks SP1 and SP2.

[45CSR13, Permit No. R13-2631, 4.2.6., (SP1, SP2)]

- 4.2.7. For the purpose of demonstrating compliance with condition 4.1.14, the permittee shall maintain records of Solvent 1 and Solvent 3 transfers that result in container emissions directly to the air.

[45CSR13, Permit No. R13-2631, 4.2.7., (KXX)]

- 4.2.8. The permittee shall comply with applicable monitoring requirements of 40 C.F.R. Part 63 Subpart FFFF. Monitoring requirements are listed in Table 1 of this attachment.

[45CSR13, R13-2631, Section 4.2.8.]

4.3. Testing Requirements

- 4.3.1. For the purpose of demonstrating compliance with Condition 4.1.17, the permittee shall conduct pressure testing per the provisions of 40 C.F.R. § 63.2480.

[45CSR13, Permit No. R13-2631 - (Condition 4.3.1.)]

- 4.3.2. The permittee shall comply with applicable testing requirements of 40 C.F.R. Part 63 Subpart FFFF. Testing requirements are listed in Table 1 of this attachment.

[45CSR13, R13-2631, Section 4.3.2.]

4.4. Recordkeeping Requirements

- 4.4.1. **Record of Maintenance of Air Pollution Control Equipment.** For all air pollution control equipment identified in Condition 4.1.19 (K07 – Filter, L15 - Flare) and the control measures applied to the pumps and agitators in VOC and/or HAP service associated with the organo-metallic production unit #2, the permittee shall maintain accurate records of all required pollution control equipment inspection and/or preventative maintenance procedures.

[45CSR13, Permit R13-2631 – (Condition 4.4.2) (K07, L15)]

- 4.4.2. **Record of Malfunctions of Air Pollution Control Equipment.** For all air pollution control equipment identified in Condition 4.1.19 (K07 – Filter, L15 - Flare) and the control measures applied to the pumps and agitators in VOC and/or HAP service associated with the organo-metallic production unit #2, the permittee shall maintain records of the occurrence and duration of

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

any malfunction or operational shutdown of the air pollution control equipment during which excess emissions occur. For each such case, the following information shall be recorded:

- a. The equipment involved.
- b. Steps taken to minimize emissions during the event.
- c. The duration of the event.
- d. The estimated increase in emissions during the event.

For each such case associated with an equipment malfunction, the additional information shall also be recorded:

- e. The cause of the malfunction.
- f. Steps taken to correct the malfunction.
- g. Any changes or modifications to equipment or procedures that would help prevent future recurrences of the malfunction.

[45CSR13, Permit R13-2631 – (Condition 4.4.3) (K07, L15)]

4.4.3. The permittee shall keep any and all records and reports of testing and monitoring as required in Sections 4.2 and 4.3 in accordance with Section 3.4.2.

[45CSR13, Permit No. R13-2631 - (Condition 4.4.4.)]

4.4.4. For the purposes of demonstrating compliance with all of the annual emissions limits stated in Section 4.1, the permittee shall record all necessary data or information to determine the annual emissions from the respective emission point on a per pollutant basis. These records shall be kept in such manner that demonstrates compliance with the annual emission limit that is stated in this permit on a 12 month rolling total basis. All records shall be maintained in accordance with Section 3.4.2.

[45CSR13, Permit No. R13-2631 - (Condition 4.4.5.)]

4.4.5. For the purposes of determined compliance with all of the annual emission limits stated within Section 4.1, the permittee shall calculate or determine the 12 month rolling total as defined in 4.1.15 or each emission point by pollutant for each calendar month. The permittee shall submit a compliance report on a semiannual basis. The periods for these determinations shall run from January 1 to June 30 for the first half and July 1 to December 31 for the second half. These determinations shall be made no later than 60 days after end the respective semi-annual period or as otherwise provided in the 45CSR30 air permit. All records and calculations shall be maintained in accordance with Section 3.4.1.

[45CSR13, Permit No. R13-2631 - (Condition 4.4.6.)]

4.4.6. The permittee shall comply with the applicable recordkeeping requirements of 40 C.F.R. 63 Subpart FFFF. Recordkeeping requirements are listed in Table 1 of this attachment.

[45CSR13, R13-2631 - (Condition 4.4.7.)]

4.5. Reporting Requirements

4.5.1. The permittee shall comply with the applicable reporting requirements of 40 C.F.R. 63 Subpart FFFF. Reporting requirements are listed in Table 1 of this attachment.

[45CSR13, R13-2631, Condition 4.5.1.]

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

4.6. Compliance Plan

N/A

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Table 1

Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts SS, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Continuous Process Vents (K06/E-325 - Product Separation and Solvent Recovery Process) Group Status Determination	40 C.F.R. § 63.2455 (b)	Designate as Group 1 or determine total resource effectiveness (TRE) index.	Based on engineering calculations TRE Index is 4.82. K06/E-325 is a Group 2 Continuous Process Vent.
Continuous Process Vent - Group 2 (K06/E-325-Product Separation and Solvent Recovery – Recovery Device)	40 C.F.R. § 63.2455 (c) 40 C.F.R. § 63.982 (e) 40 C.F.R. § 63.993 (a) (2)	Except as provided below, recovery device E-325 shall be operated at all times when hazardous air pollutant emissions are vented to the device. Exceptions: - during system breakdowns, repairs, maintenance periods, instrument adjustments or calibration checks. - when operating scenario UT-OMU2-05 for standby operations is utilized. <i>Comment: During Process Standby Operating Scenario # UT-OMU2-05, the TRE Index is greater than 5.0 and operation of E-325 is not required to meet MON requirements.</i>	Continuously monitor and record condenser vent gas exit (product side) temperature except during Process Standby Operating Scenario # UT-OMU2-05. Group 2 continuous vent TRE Index greater than 1.9 but less than 5.0.
Batch Process Vents Group Status – Operating Scenario #UT-OMU2-01 (Production Steps)	40 C.F.R. §§ 63.2460 (a) and (b)	Determine uncontrolled HAP emissions from each batch vent using procedures in 40 C.F.R. §§ 63.1257 (d) (2) (i) and (ii)	Uncontrolled emissions were documented per requirements. See Attachment N of the R13-2631A and Title V SM02 application. Group 2 - Uncontrolled emissions are greater than 200 lbs/yr but less than 10,000 lbs/yr when combined with other batch process vents in common header

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts H, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Batch Process Vents Group Status – Operating Scenario #UT-OMU2-02 (Equipment Washes)	40 C.F.R. §§ 63.2460 (a) and (b)	Determine uncontrolled HAP emissions from each batch vent using procedures in 40 C.F.R. §§ 63.1257 (d) (2) (i) and (ii)	Uncontrolled emissions were documented per requirements. See Attachment D of the R13-2631A application. Group 2 - Uncontrolled emissions are greater than 200 lbs/yr but less than 10,000 lbs/yr when combined with other batch process vents in common header
Batch Process Vent – Group 2 – Equipment Washes (K05/E400 Reactor/Condenser)	40 C.F.R. §§ 63.2460 (c) (1), (c) (2) (v); 63.1257 (d) (2) (i) (C) (4) (ii), 63.1257 (d) (3) (iii) (B)	Conduct one-time demonstration that Condenser E400 is working properly (during boiling operations) – i.e. exhaust gas temperature is less than boiling or bubbling point.	To be completed within 180 days of commencement of operation.
Batch Process Vents - Operating scenarios	40 C.F.R. §§ 63.2525 (b) and (c)	Maintain a schedule or log of operating scenarios, updated each time a new operating scenario is put into operation	See recordkeeping section.
Equipment Leaks, General	40 C.F.R. § 63.2480 (a) – Table 6 of Subpart FFFF 40 C.F.R. §§ 63.2480 (b) (1) and (2) 40 C.F.R. §§ 63.178 (a) and (b)	Conduct a pressure test of each process train at least annually. • Pressure testing for leaks is not required after reconfiguration of an equipment train if flexible hose connections are the only disturbed equipment.	The facility will comply with the requirements for equipment leaks by following Subpart H, Pressure Testing Alternative.
Equipment Leaks, Pressure Relief Devices in Gas/Vapor Service	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.165	Pressure relief devices shall be operated with an instrument reading of 500 ppm or less above background.	UT interprets this requirement as being applicable to pressure relief devices that are not part of process equipment train that is checked for leaks using pressure testing. If a pressure relief device opens to prevent an un-safe operating condition, the process equipment train will be pressure tested within 5 days of the release or return to operation,
Equipment Leaks, Sampling Connection Systems	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.166	Each sampling system shall be equipped with a closed-purge, closed-loop, and system.	Sample purges will be collected for disposal by an approved facility.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts F, SS, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Equipment Leaks, Open-ended Lines or Valves	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.167	Each open-ended line or valve shall be equipped with a cap, blind, flange, purge, or a second valve unless otherwise allowed by 40 C.F.R. §§ 63.167 (c) through (e)	Implement work practice standard.
Maintenance Wastewater	40 C.F.R. § 63.105; 40 C.F.R. § 63.2525 (a)	Develop and maintain a plan for minimizing HAP emissions during maintenance activities including startup, shutdown and malfunctions.	See recordkeeping section.
Continuous Parameter Monitoring System (CPMS) for Continuous Process Vent - Group 2 (K06/E-325-Product Separation and Solvent Recovery – Recovery Device)	40 C.F.R. §§ 63.996 (c) (1), (c) (4) and (5)	Except as provided below, the CPMS for Condenser (E-325) vent gas exit (product side) temperature shall be in continuous operation when hazardous air pollutant emissions are being routed to the recovery device. Measurements must be representative of the monitoring activity. Exceptions: - during system breakdowns, repairs, maintenance periods, instrument adjustments or calibration checks. - when operating scenario UT-OMU2-05 for standby operations is utilized.	Maintain continuous monitoring records. Good engineering practices will be used for installation of the condenser vent gas temperature monitoring device.
Continuous Parameter Monitoring System (CPMS) for Continuous Process Vent - Group 2 (K06/E-325-Product Separation and Solvent Recovery – Recovery Device)	40 C.F.R. § 63.6 (e) (3) 40 C.F.R. § 63.2525 (j)	Maintain a plan for minimizing emissions of hazardous air pollutants during Product Separation and Solvent Recovery System (K06/E-325) startup, shutdown and malfunction events.	Startup, shutdown, and malfunction plan (SSMP) to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Monitoring			
Parameter and/or Affected Equipment	Subparts SS, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
<p>Continuous Process Vent - Group 2</p> <p>(K06/E-325-Product Separation and Solvent Recovery – Recovery Device)</p>	<p>40 C.F.R. § 63.2455 (c)</p> <p>40 C.F.R. § 63.993 (c) (2)</p> <p>40 C.F.R. §§ 63.996 (c) (1) – (6)</p>	<p>Continuously monitor Condenser E-325 vent gas exit (product side) temperature.</p> <p>Condenser (E-325) vent gas temperature CPMS must be installed, calibrated, operated and maintained per manufacturer’s specification.</p> <p>Establish a range for proper operation and submit information (range, justification and operating cycles) with Notification of Compliance status.</p>	<p>Condenser vent gas exit temperature will be monitored using a thermocouple.</p> <p>Information regarding CPMS installation, calibration, operation and maintenance will be maintained in the Plant files.</p> <p>See NOCS for range of proper operation.</p> <p>A data acquisition and handling system will be used to record product side temperature in accordance with 40 C.F.R. § 63.998 (b).</p>

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Recordkeeping			
Parameter and/or Affected Equipment	Subparts A, G, SS, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
	General Provisions 40 C.F.R. § 63.10 (b) (1)	Maintain required records for five years except as otherwise provided by this permit.	Documentation to be maintained in Plant files.
	40 C.F.R. § 63.2520 (d)	Maintain a copy of all compliance reports and any subsequent addendums or revisions.	Documentation to be maintained in Plant files.
Initial Applicability Determination	40 C.F.R. § 63.2435 (a)-(b) 40 C.F.R. § 63.2455 (b), 40 C.F.R. § 63.115 (d) 40 C.F.R. § 63.2515 (b)	Maintain records and supporting documentation to determine MON applicability to process equipment and operations.	Documentation to be maintained in Plant files.
Batch Process Vents - Operating scenarios	40 C.F.R. §§ 63.2525 (b) and (c)	Keep record of each operating scenario and a schedule or log of operating scenarios, updated each time a new operating scenario is put into operation	Documentation to be maintained in Plant files.
Group 2 Batch Process Vents (K04 Solvent Tank) (K05 Reactor) (K08 Hold Tank) (K18 Solvent Tank) (Group 2 Batch Process Vents are uncontrolled emissions greater than 200 lbs/yr but less than 10,000 lbs/yr)	40 C.F.R. § 63.2525 (e)	Record the following information for Group 2 batch process vents: <ul style="list-style-type: none"> • Day batch was completed • If batch was standard or non-standard • The estimated uncontrolled and controlled emissions for each batch that is considered to be a nonstandard batch. • Records of the daily 365-day rolling summations of emissions, or alternative records that correlate to the emissions (e.g., number of batches), calculated no less frequently than monthly. 	Documentation to be maintained in Plant files.
Safety Relief Device	40 C.F.R. § 63.2525 (f), 40 C.F.R. § 63.2450 (p)	Record each time a safety relief device opens to the air to avoid unsafe condition	Documentation to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Recordkeeping			
Parameter and/or Affected Equipment	Subpart SS, FFFF Citation	Requirements	Compliance Demonstration and/or Comments
<p>Continuous Monitoring Parameter System (CPMS)</p> <p>Vent Gas (Product Side) Exit Temperature Measurement for Recovery Device</p> <p>(E-325)</p>	<p>40 C.F.R. § 63.2450 (k) 40 C.F.R. §§63.998 (b) (1) - (3)</p>	<ul style="list-style-type: none"> • Except as otherwise provided by this permit, record Condenser E-325 vent gas exit operating temperature at least once every 15 minutes or as otherwise specified below i) A record of values measured at least once every 15 minutes or each measured value for systems which measure more frequently than once every 15 minutes; or (ii) A record of block average values for 15-minute or shorter periods calculated from all measured data values during each period or from at least one measured data value per minute if measured more frequently than once per minute. (iii) Where data is collected from an automated continuous parameter monitoring system, the owner or operator may calculate and retain block hourly average values from each 15-minute block average period or from at least one measured value per minute if measured more frequently than once per minute, and discard all but the most recent three valid hours of continuous (15-minute or shorter) records, if the hourly averages do not exclude periods of CPMS breakdown or malfunction. An automated CPMS records the measured data and calculates the hourly averages through the use of a computerized data acquisition system. • Record the daily average product side operating temperature. 	<p>A data acquisition and handling system will be used to record condenser vent exit gas temperature in accordance with 40 C.F.R. § 63.998 (b)</p>

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Recordkeeping			
Parameter and/or Affected Equipment	Subparts SS, FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Continuous Monitoring Parameter System (CPMS) Product Side Exit Temperature Measurement for Recovery Device (E-325)	40 C.F.R. § 63.2525 (g) 40 C.F.R. § 63.2450 (k) (1) 40 C.F.R. § 63.998 (a) (3) 40 C.F.R. § 63.998 (b) (1), (2), and (3) 40 C.F.R. § 63.998 (c) (1) 40 C.F.R. § 63.998 (c) (3) (i) 40 C.F.R. § 63.998 (c) (3) (ii)	Record the following information for Condenser E-325 exit vent gas temperature monitoring device <ul style="list-style-type: none"> • The procedure used for calibrating. • The date and time of completion of calibration and preventive maintenance. • The “as found” and “as left” CPMS readings, whenever an adjustment is made that affects the CPMS reading and a “no adjustment” statement otherwise • The start time and duration (or start and stop times) of any periods when the CPMS is inoperative • The occurrence and duration of each startup, shutdown, and malfunction of the CPMS during which excess emissions occur. • Documentation of whether procedures specified in the startup, shutdown, and malfunction plan were followed for each startup, shutdown, and • malfunction during which excess emissions occurred. • Documentation of each startup, shutdown, and malfunction event. • Documentation that there were no excess emissions during each startup, shutdown, or malfunction event, as applicable. • The total duration of operating time during the reporting period. • Record the daily average for periods when the condenser exist vent gas temperature limit is exceeded. 	Documentation to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Recordkeeping			
Parameter and/or Affected Equipment	Subparts H, FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Equipment Leaks, General	40 C.F.R. § 63.2525 (a) 40 C.F.R. §§ 63.181 (e) (1)-(e) (6);	<p>Maintain records of the following information:</p> <ul style="list-style-type: none"> • The identification of each product or product code produced. • Process equipment subject to the MON identified on a plant site plan, in log entries, or by other appropriate methods. • The dates of each pressure test, the test pressure, and the pressure drop observed during the test. • Records of any visible, audible, or olfactory evidence of fluid loss for equipment in hazardous air pollutant service. • When a process equipment train does not pass two consecutive pressure tests, the following information shall be recorded in a log and kept for 2 years: <ul style="list-style-type: none"> - The date of each pressure test and the date of each leak repair attempt. - Repair methods applied in each attempt to repair the leak. - The reason for the delay of repair. - The expected date for delivery of the replacement equipment and the actual date of delivery of the replacement equipment. - The date of successful repair. 	Documentation to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Notification of Compliance Status (NOCS)	40 C.F.R. § 63.2520 (d) 40 C.F.R. § 63.2520 (e)	Maintain a copy of the initial NOCS report and supporting documentation and any subsequent revisions.	Revised NOCS provided in Section T of permit application.
Schedule of Reports	40 C.F.R. § 63.2520 (b) and Table 8 of Subpart FFFF	Semi-annual compliance reporting periods . First reporting period begins on the compliance date and extends to June 30 or December 31; whichever is later (thus the first reporting period is longer than 6 months).	Submit reports within 60 days of each calendar half or as otherwise allowed by Regulation 30 operating permit.
Semi-annual Compliance Report Required Information General	40 C.F.R. § 63.2520 (e)	The report shall include company name, compliance certification and reporting period covered.	To be provided in semi-annual compliance report.
Semi-annual Compliance Report Required Information Continued, SSM Events	40 C.F.R. § 63.2520 (e) (4)	For each SSM event that caused excess emissions of hazardous air pollutants, report whether the actions were consistent with the SSMP procedures and a brief discussion of each malfunction.	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Required Information Continued, Deviations	40 C.F.R. § 63.2520 (e) (5)	<p>Report any deviation from emission limits, operating limit, or work place standard of applicable Subpart FFF provisions.</p> <p>For the CPMS used to monitor and record Condenser E-325 vent gas exit temperature, report the following information if a deviation of an emission limit or operating limit occurs:</p> <ul style="list-style-type: none"> - date and time that CPMS inoperative. - date and time that each deviation started and stopped and whether each deviation occurred during a period of SSM. - a summary of the total duration of the deviation during the reporting period and the total duration as a percent of the total operating time of the process. - a breakdown of the total duration of the deviations of the process that are due to startup, shutdown, process problems, other known causes, and other unknown causes. - a summary of the total duration of CMS downtime during the reporting period, and the total duration of CMS downtime as a percent of the operating time. - identify the HAPs in the emission stream. - the operating day average value of the condenser vent exit gas temperature for each day when the deviation occurred. 	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Continued, Operating scenarios	40 C.F.R. § 63.2520 (e) (7)	Submit each new operating scenario implemented during the reporting period	To be provided in semi-annual compliance report.
Semi-annual Compliance Report Continued, Process Unit groups	40 C.F.R. § 63.2520 (e) (8)	Submit records of any new or re-determination of process unit group	To be provided in semi-annual compliance report.
Semi-annual Compliance Report Equipment Leaks	40 C.F.R. § 63.2520 (e) (9)	Report the following : (1) Batch product process equipment train identification; (2) The number of pressure tests conducted; (3) The number of pressure tests where the equipment train failed the pressure test; (4) The facts that explain any delay of repairs.	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Process Changes	40 C.F.R. § 63.2520 (e) (10)	<p>Report the following information:</p> <ul style="list-style-type: none"> • A process change, or change any of the information submitted in the NOCS report or a previous compliance report, that is not within the scope of an existing operating scenario. A process change does not include moving within a range of conditions identified in the standard batch, and a nonstandard batch • Other process change or changes (except for Group 2 vent becoming a Group 1 vent) in any of the information submitted in the NOCS report or a previous report changes, that is not within the scope of an existing operating scenario. <p>The report must include the following information :</p> <ul style="list-style-type: none"> - A description of the process change. - Revisions to any of the information reported in the original notification of compliance status report. - Information required by the notification of compliance status report for changes involving the addition of processes or equipment at the affected source. 	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Other Process Changes	40 C.F.R. § 63.2520 (e) (10), continued	Submit a report 60 days before the scheduled implementation date any change from Group 2 to Group 1. The report must include the following information : - A description of the process change. - Revisions to any of the information reported in the original notification of compliance status report. - Information required by the notification of compliance status report for changes involving the addition of processes or equipment at the affected source.	Management of Change Procedure. Submit report within time frame of regulatory provision.
Semi-annual Compliance Report CPMS Exit (Product Side Temperature for Recovery Device (E-325)	40 C.F.R. § 63.999 (c) (1) Periodic reports	CPMS report for shall include dates, total source operating time and information identified in specified subpart when parameter outside range.	To be provided in semi-annual compliance report.
Semi-annual Compliance Report CPMS Vent Gas Exit (Product Side) Temperature for Recovery Device (E-325)	40 C.F.R. § 63.2520 (d) (2)	Submit the result of Condenser E-325 TRE Index evaluation as an addendum to Notification of Compliance Status Report with the semi-annual compliance report or within 60 days following completion of vent measurements, whichever is later.	
Batch Process Vent – Group 2 – Equipment Washes (K05/E400 Reactor/Condenser)	40 C.F.R. §§ 63.2460 (c) (1), (c) (2) (v); 40 C.F.R. § 63.1257 (d) (2) (i) (C) (4) (ii), 40 C.F.R. § 63.1257 (d) (3) (iii) (B)	Include the one-time initial demonstration that Condenser E-400 is properly operated in the Notification of Compliance Status Report	To be submitted in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-A (OMU2 Process)
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Testing			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Continuous Process Vent - Group 2 (K06/E-325-Product Separation and Solvent Recovery – Recovery Device	40 C.F.R. § 63.2455 (b) 40 C.F.R. § 63.115 (d) (ii)	Perform the following measurements for the representative operating condition expected to yield the lowest TRE index value for Condenser E-325 exit vent gas: <ul style="list-style-type: none"> • vent stream flow rate • net vent stream heating value • total organic carbon emission rate • total organic HAP emission rate 	Report submitted by cover letter dated 6/21/2010. No further action required.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Emission Units

OMU3 Process		
Emission Unit ID	Emission Point ID	Emission Unit Description
J01	AF4 or EJ01	J01 Reactor
K18	AF4	K18 Tank – Solvent 3
L15	AF4	Flare
SP1	AX1	SP1 Tank – Solvent 2
SP2	AX2	SP2 Tank – Solvent 2
SP6	AX6	SP6 Tank – Solvent 2

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

The OMU3 Process is covered by 40 CFR 63, Subpart FFFF – NESHAPS for Miscellaneous Organic Chemical Manufacturing Operations (MON). Applicable MON requirements are summarized below.

Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Batch Process Vents Group Status – Operating Scenario #UT-OMU3-01 (Production Steps)	40 C.F.R. §§ 63.2460 (a) and (b)	Determine uncontrolled HAP emissions from each batch vent using procedures in 40 C.F.R. §§ 63.1257 (d) (2) (i) and (ii)	Uncontrolled emissions were documented per requirements. Group 2 - Uncontrolled emissions are greater than 200 lbs/yr but less than 10,000 lbs/yr when combined with other batch process vents in common header
Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts H, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Batch Process Vents - Operating scenarios	40 C.F.R. §§ 63.2525 (b) and (c)	Maintain a schedule or log of operating scenarios, updated each time a new operating scenario is put into operation	See recordkeeping section.
Equipment Leaks, General	40 C.F.R. § 63.2480 (a) – Table 6 of Subpart FFFF 40 C.F.R. §§ 63.2480 (b) (1) and (2) 40 C.F.R. §§ 63.178 (a) and (b)	Conduct a pressure test of each process train at least annually. • Pressure testing for leaks is not required after reconfiguration of an equipment train if flexible hose connections are the only disturbed equipment.	The facility will comply with the requirements for equipment leaks by following Subpart H, Pressure Testing Alternative.
Equipment Leaks, Pressure Relief Devices in Gas/Vapor Service	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.165	Pressure relief devices shall be operated with an instrument reading of 500 ppm or less above background.	UT interprets this requirement as being applicable to pressure relief devices that are not part of process equipment train that is checked for leaks using pressure testing. If a pressure relief device opens to prevent an un-safe operating condition, the process equipment train will be pressure tested within 5 days of the release or return to operation,
Equipment Leaks, Sampling Connection Systems	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.166	Each sampling system shall be equipped with a closed-purge, closed-loop, and system.	Sample purges will be collected for disposal by an approve facility.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Operating Limits and Standards			
Parameter and/or Affected Equipment	Subparts FFFF Citations	Requirements	Compliance Demonstration and/or Comments
Equipment Leaks, Open-ended Lines or Valves	40 C.F.R. §§ 63.178 (b) (1) and (2) 40 C.F.R. § 63.167	Each open-ended line or valve shall be equipped with a cap, blind, flange, purge, or a second valve unless otherwise allowed by 40 C.F.R. §§ 63.167 (c) through (e)	Implement work practice standard.
Monitoring			
		Not Applicable	
Recordkeeping			
Parameter and/or Affected Equipment	Subparts A, G, FFFF Citations	Requirements	Compliance Demonstration and/or Comments
	General Provisions 40 C.F.R. § 63.10 (b) (1)	Maintain required records for five years except as otherwise provided by this permit.	Documentation to be maintained in Plant files.
	40 C.F.R. § 63.2520 (d)	Maintain a copy of all compliance reports and any subsequent addendums or revisions.	Documentation to be maintained in Plant files.
Initial Applicability Determination	40 C.F.R. § 63.2435 (a)-(b), 40 C.F.R. § 63.115 (d) 40 C.F.R. § 63.2515 (b)	Maintain records and supporting documentation to determine MON applicability to process equipment and operations.	Documentation to be maintained in Plant files.
Batch Process Vents - Operating scenarios	40 C.F.R. §§ 63.2525 (b) and (c)	Keep record of each operating scenario and a schedule or log of operating scenarios, updated each time a new operating scenario is put into operation	Documentation to be maintained in Plant files.
Group 2 Batch Process Vents (J01 Reactor) (K18 Solvent Tank) Process Vents are uncontrolled emissions greater than 200 lbs/yr but less than 10,000 lbs/yr)	40 C.F.R. § 63.2525 (e)	Record the following information for Group 2 batch process vents: <ul style="list-style-type: none"> • Day batch was completed • If batch was standard or non-standard • The estimated uncontrolled and controlled emissions for each batch that is considered to be a nonstandard batch. • Records of the daily 365-day rolling summations of emissions, or alternative records that correlate to the emissions (e.g., number of batches), calculated no less frequently than monthly. 	Documentation to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Safety Relief Device	40 C.F.R. § 63.2525 (f), 40 C.F.R. § 63.2450 (p)	Record each time a safety relief device opens to the air to avoid unsafe condition	Documentation to be maintained in Plant files.
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Recordkeeping			
Parameter and/or Affected Equipment	Subparts H, FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Equipment Leaks, General	40 C.F.R. § 63.2525 (a) 40 C.F.R. §§ 63.181 (e) (1)-(e) (6);	<p>Maintain records of the following information:</p> <ul style="list-style-type: none"> • The identification of each product or product code produced. • Process equipment subject to the MON identified on a plant site plan, in log entries, or by other appropriate methods. • The dates of each pressure test, the test pressure, and the pressure drop observed during the test. • Records of any visible, audible, or olfactory evidence of fluid loss for equipment in hazardous air pollutant service. • When a process equipment train does not pass two consecutive pressure tests, the following information shall be recorded in a log and kept for 2 years: <ul style="list-style-type: none"> - The date of each pressure test and the date of each leak repair attempt. - Repair methods applied in each attempt to repair the leak. - The reason for the delay of repair. - The expected date for delivery of the replacement equipment and the actual date of delivery of the replacement equipment. - The date of successful repair. 	Documentation to be maintained in Plant files.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Notification of Compliance Status (NOCS)	40 C.F.R. § 63.2520 (d) 40 C.F.R. § 63.2520 (e)	Maintain a copy of the initial NOCS report and supporting documentation and any subsequent revisions.	NOCS on file.
Schedule of Reports	40 C.F.R. § 63.2520 (b) and Table 8 of Subpart FFFF	Semi-annual compliance reporting periods . First reporting period begins on the compliance date and extends to June 30 or December 31; whichever is later (thus the first reporting period is longer than 6 months).	Submit reports within 60 days of each calendar half or as otherwise allowed by Regulation 30 operating permit.
Semi-annual Compliance Report Required Information	40 C.F.R. § 63.2520 (e)	The report shall include company name, compliance certification and reporting period covered.	To be provided in semi-annual compliance report.
General			

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Continued, Operating scenarios	40 C.F.R. § 63.2520 (e) (7)	Submit each new operating scenario implemented during the reporting period	To be provided in semi-annual compliance report.
Semi-annual Compliance Report Continued, Process Unit groups	40 C.F.R. § 63.2520 (e) (8)	Submit records of any new or re-determination of process unit group	To be provided in semi-annual compliance report.
Semi-annual Compliance Report Equipment Leaks	40 C.F.R. § 63.2520 (e) (9)	Report the following : (1) Batch product process equipment train identification; (2) The number of pressure tests conducted; (3) The number of pressure tests where the equipment train failed the pressure test; (4) The facts that explain any delay of repairs.	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Process Changes	40 C.F.R. § 63.2520 (e) (10)	<p>Report the following information:</p> <ul style="list-style-type: none"> • A process change, or change any of the information submitted in the NOCS report or a previous compliance report, that is not within the scope of an existing operating scenario. A process change does not include moving within a range of conditions identified in the standard batch, and a nonstandard batch • Other process change or changes (except for Group 2 vent becoming a Group 1 vent) in any of the information submitted in the NOCS report or a previous report changes, that is not within the scope of an existing operating scenario. <p>The report must include the following information :</p> <ul style="list-style-type: none"> - A description of the process change. - Revisions to any of the information reported in the original notification of compliance status report. - Information required by the notification of compliance status report for changes involving the addition of processes or equipment at the affected source. 	To be provided in semi-annual compliance report.

Univation Technologies South Charleston Catalyst Plant
Attachment I-B – OMU3 Process
Applicable Requirements and Proposed Monitoring, Recordkeeping and Reporting

Reporting			
Parameter and/or Affected Equipment	Subpart FFFF Citation	Requirements	Compliance Demonstration and/or Comments
Semi-annual Compliance Report Other Process Changes	40 C.F.R. § 63.2520 (e) (10), continued	Submit a report 60 days before the scheduled implementation date any change from Group 2 to Group 1. The report must include the following information : - A description of the process change. - Revisions to any of the information reported in the original notification of compliance status report. - Information required by the notification of compliance status report for changes involving the addition of processes or equipment at the affected source.	Management of Change Procedure. Submit report within time frame of regulatory provision.
Testing			
		Not Applicable	

**Univation Technologies South Charleston Catalyst Plant
Attachment J**

Supporting Documentation

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product name : Genetron® 404A

MSDS Number : 000000009893

Product Use Description : Refrigerant

Manufacturer or supplier's details : Honeywell International Inc.
115 Tabor Road
Morris Plains, NJ 07950-2546

For more information call : 800-522-8001
+1-973-455-6300
(Monday-Friday, 9:00am-5:00pm)

In case of emergency call : **Medical: 1-800-498-5701 or +1-303-389-1414**
: **Transportation (CHEMTREC): 1-800-424-9300 or +1-703-527-3887**
:
: (24 hours/day, 7 days/week)

SECTION 2. HAZARDS IDENTIFICATION**Emergency Overview**

Form : Liquefied gas

Color : colourless

Odor : weak

Classification of the substance or mixture

Classification of the substance or mixture : Gases under pressure, Liquefied gas
Simple Asphyxiant

GHS Label elements, including precautionary statements

SAFETY DATA SHEET

Honeywell

Genetron® 404A

000000009893

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

Symbol(s)



Signal word

: Warning

Hazard statements

: Contains gas under pressure; may explode if heated.
May displace oxygen and cause rapid suffocation.

Precautionary statements

: **Storage:**
Protect from sunlight. Store in a well-ventilated place.Hazards not otherwise
classified: May cause cardiac arrhythmia.
May cause frostbite.
May cause eye and skin irritation.**Carcinogenicity**

No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP, IARC, or OSHA.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical nature

: Mixture

Chemical Name	CAS-No.	Concentration
1,1,1-Trifluoroethane	420-46-2	52.00 %
Pentafluoroethane	354-33-6	44.00 %
1,1,1,2-Tetrafluoroethane	811-97-2	4.00 %

SECTION 4. FIRST AID MEASURES

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

- Inhalation** : Move to fresh air. If breathing is irregular or stopped, administer artificial respiration. Use oxygen as required, provided a qualified operator is present. Call a physician. Do not give drugs from adrenaline-ephedrine group.
- Skin contact** : After contact with skin, wash immediately with plenty of water. If there is evidence of frostbite, bathe (do not rub) with lukewarm (not hot) water. If water is not available, cover with a clean, soft cloth or similar covering. If symptoms persist, call a physician.
- Eye contact** : Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. In case of frostbite water should be lukewarm, not hot. If symptoms persist, call a physician.
- Ingestion** : Unlikely route of exposure. As this product is a gas, refer to the inhalation section. Do not induce vomiting without medical advice. Call a physician immediately.
- Notes to physician**
- Treatment** : Because of the possible disturbances of cardiac rhythm, catecholamine drugs, such as epinephrine, should be used with special caution and only in situations of emergency life support. Treatment of overexposure should be directed at the control of symptoms and the clinical conditions. Treat frost-bitten areas as needed.

SECTION 5. FIREFIGHTING MEASURES

- Suitable extinguishing media** : The product is not flammable.
ASHRAE 34
Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
- Specific hazards during firefighting** : Contents under pressure.
This product is not flammable at ambient temperatures and atmospheric pressure.
However, this material can ignite when mixed with air under pressure and exposed to strong ignition sources.

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

Container may rupture on heating.
 Cool closed containers exposed to fire with water spray.
 Do not allow run-off from fire fighting to enter drains or water courses.
 Vapours are heavier than air and can cause suffocation by reducing oxygen available for breathing.
 In case of fire hazardous decomposition products may be produced such as:
 Hydrogen fluoride
 Carbon monoxide
 Carbon dioxide (CO₂)
 Carbonyl halides

Special protective equipment for firefighters : In the event of fire and/or explosion do not breathe fumes.
 Wear self-contained breathing apparatus and protective suit.
 No unprotected exposed skin areas.

Further information : Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions : Immediately evacuate personnel to safe areas.
 Keep people away from and upwind of spill/leak.
 Wear personal protective equipment. Unprotected persons must be kept away.
 Remove all sources of ignition.
 Avoid skin contact with leaking liquid (danger of frostbite).
 Ventilate the area.
 After release, disperses into the air.
 Vapours are heavier than air and can cause suffocation by reducing oxygen available for breathing.
 Avoid accumulation of vapours in low areas.
 Unprotected personnel should not return until air has been tested and determined safe.
 Ensure that the oxygen content is $\geq 19.5\%$.

Environmental precautions : Prevent further leakage or spillage if safe to do so.
 The product evaporates readily.

Methods for cleaning up : Ventilate the area.

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

SECTION 7. HANDLING AND STORAGE**Handling****Handling**

: Handle with care.
Avoid inhalation of vapour or mist.
Do not get in eyes, on skin, or on clothing.
Wear personal protective equipment.
Pressurized container. Protect from sunlight and do not expose to temperatures exceeding 50 °C.
Follow all standard safety precautions for handling and use of compressed gas cylinders.
Use authorized cylinders only.
Protect cylinders from physical damage.
Do not puncture or drop cylinders, expose them to open flame or excessive heat.
Do not pierce or burn, even after use. Do not spray on a naked flame or any incandescent material.
Do not remove screw cap until immediately ready for use.
Always replace cap after use.

Advice on protection against fire and explosion

: The product is not flammable.
Can form a combustible mixture with air at pressures above atmospheric pressure.

Storage**Requirements for storage areas and containers**

: Pressurized container: protect from sunlight and do not expose to temperatures exceeding 50 °C. Do not pierce or burn, even after use.
Keep containers tightly closed in a dry, cool and well-ventilated place.
Storage rooms must be properly ventilated.
Ensure adequate ventilation, especially in confined areas.
Protect cylinders from physical damage.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION**Protective measures**

: Do not breathe vapour.
Do not get in eyes, on skin, or on clothing.

Genetron® 404A**00000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

- Ensure that eyewash stations and safety showers are close to the workstation location.
- Engineering measures** : General room ventilation is adequate for storage and handling. Perform filling operations only at stations with exhaust ventilation facilities.
- Eye protection** : Wear as appropriate:
Safety glasses with side-shields
If splashes are likely to occur, wear:
Goggles or face shield, giving complete protection to eyes
- Hand protection** : Leather gloves
In case of contact through splashing:
Protective gloves
Neoprene gloves
Polyvinyl alcohol or nitrile- butyl-rubber gloves
- Skin and body protection** : Avoid skin contact with leaking liquid (danger of frostbite).
Wear cold insulating gloves/ face shield/ eye protection.
- Respiratory protection** : In case of insufficient ventilation, wear suitable respiratory equipment.
Wear a positive-pressure supplied-air respirator.
Vapours are heavier than air and can cause suffocation by reducing oxygen available for breathing.
For rescue and maintenance work in storage tanks use self-contained breathing apparatus.
- Hygiene measures** : Handle in accordance with good industrial hygiene and safety practice.
Ensure adequate ventilation, especially in confined areas.
Do not get in eyes, on skin, or on clothing.
Remove and wash contaminated clothing before re-use.
Keep working clothes separately.

Exposure Guidelines

Components	CAS-No.	Value	Control parameters	Update	Basis
1,1,1-Trifluoroethane	420-46-2	TWA : time weighted average	(1,000 ppm)		Honeywell Limit established by Honeywell International Inc.

SAFETY DATA SHEET

Honeywell

Genetron® 404A

000000009893

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

1,1,1-Trifluoroethane	420-46-2	TWA : time weighted average	3,400 mg/m3 (1,000 ppm)	2007	WEEL: US. AIHA Workplace Environmental Exposure Level (WEEL) Guides
Pentafluoroethane	354-33-6	TWA : time weighted average	4,900 mg/m3 (1,000 ppm)	2007	WEEL: US. AIHA Workplace Environmental Exposure Level (WEEL) Guides
Pentafluoroethane	354-33-6	TWA : time weighted average	(1,000 ppm)		Honeywell Limit established by Honeywell International Inc.
1,1,1,2-Tetrafluoroethane	811-97-2	TWA : time weighted average	(1,000 ppm)		Honeywell Limit established by Honeywell International Inc.
1,1,1,2-Tetrafluoroethane	811-97-2	TWA : time weighted average	4,240 mg/m3 (1,000 ppm)	2007	WEEL: US. AIHA Workplace Environmental Exposure Level (WEEL) Guides

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state	: Liquefied gas
Color	: colourless
Odor	: weak
pH	: Note: neutral

Genetron® 404A**00000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

Melting point/freezing point : Note: no data available

Boiling point/boiling range : -47.8 °C

Flash point : Note: not applicable

Evaporation rate : > 1
Method: Compared to CCl4.

Lower explosion limit : Note: None

Upper explosion limit : Note: None

Vapor pressure : 12,610 hPa
at 21.1 °C(70.0 °F)
25,572 hPa
at 54.4 °C(129.9 °F)

Vapor density : 3.43 Note: (Air = 1.0)

Density : 1.08 g/cm³ at 21.1 °C

Water solubility : Note: Very slightly soluble in cold water, hot water.

Partition coefficient: n-
octanol/water : log Pow: 1.06
Test substance: 1,1,1,2-tetrafluoroethane (HFC-134a)

Ignition temperature : < 750 °C

Decomposition temperature : > 250 °C

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

Global warming potential (GWP) : 3,784
Ozone depletion potential (ODP) : 0

SECTION 10. STABILITY AND REACTIVITY

Chemical stability : Stable under normal conditions.

Possibility of hazardous reactions : Hazardous polymerisation does not occur.

Conditions to avoid : Pressurized container. Protect from sunlight and do not expose to temperatures exceeding 50 °C.
Decomposes under high temperature.
Some risk may be expected of corrosive and toxic decomposition products.
Can form a combustible mixture with air at pressures above atmospheric pressure.
Do not mix with oxygen or air above atmospheric pressure.

Incompatible materials to avoid : Potassium
Calcium
Powdered metals
Finely divided aluminium
Magnesium
Zinc

Hazardous decomposition products : In case of fire hazardous decomposition products may be produced such as:
Gaseous hydrogen fluoride (HF).
Carbonyl halides
Carbon monoxide
Carbon dioxide (CO₂)

SECTION 11. TOXICOLOGICAL INFORMATION

Acute inhalation toxicity
1,1,1-Trifluoroethane : LC50: > 540000 ppm
Exposure time: 4 h
Species: rat

Genetron®404A

00000009893

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

	LC50: > 106 mg/l Exposure time: 4 h Species: rat
Pentafluoroethane	: > 769000 ppm Exposure time: 4 h Species: rat
1,1,1,2-Tetrafluoroethane	: LC50: > 500000 ppm Exposure time: 4 h Species: rat
Sensitisation 1,1,1-Trifluoroethane	: Cardiac sensitization Species: dogs Note: 1,1,1,2-tetrafluoroethane (HFC-134a): Cardiac sensitisation threshold (dog): 80000 ppm.
Pentafluoroethane	: Cardiac sensitization Species: dogs Note: No-observed-effect level 75 000 ppm Lowest observable effect level 100 000 ppm
1,1,1,2-Tetrafluoroethane	: Cardiac sensitization Species: dogs Note: No-observed-effect level 50 000 ppm Lowest observable effect level 75 000 ppm
Repeated dose toxicity 1,1,1-Trifluoroethane	: Species: rat Application Route: Inhalation Exposure time: (90 d) NOEL: 40000 ppm Subchronic toxicity
Pentafluoroethane	: Species: rat Application Route: Inhalation Exposure time: (4 Weeks)

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

NOEL: 50000 ppm
Subchronic toxicity

1,1,1,2-Tetrafluoroethane : Species: rat
NOEL: 40000 ppm

Genotoxicity in vitro
1,1,1-Trifluoroethane : Test Method: Ames test
Result: negative

Pentafluoroethane : Test Method: Ames test
Result: negative

1,1,1,2-Tetrafluoroethane : Note: In vitro tests did not show mutagenic effects

: Cell type: Human lymphocytes
Result: negative

: Cell type: Human lymphocytes
Result: negative

: Cell type: Chinese Hamster Ovary Cells
Result: negative

Genotoxicity in vivo
1,1,1-Trifluoroethane : Species: mouse
Cell type: Bone marrow
Application Route: Inhalation
Result: negative

Teratogenicity
1,1,1-Trifluoroethane : Species: rat
Application Route: Inhalation exposure
NOAEL, Teratog: 40,000 ppm
NOAEL, Maternal: 40,000 ppm
Note: Did not show teratogenic effects in animal experiments.

Species: rabbit
Application Route: Inhalation exposure
NOAEL, Teratog: 40,000 ppm

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

- NOAEL, Maternal: 40,000 ppm
Note: Did not show teratogenic effects in animal experiments.
- Pentafluoroethane : Species: rabbit
Application Route: Inhalation exposure
NOAEL, Teratog: 50,000 ppm
NOAEL, Maternal: 50,000 ppm
Note: Did not show teratogenic effects in animal experiments.
- Species: rat
Application Route: Inhalation exposure
NOAEL, Teratog: 50,000 ppm
NOAEL, Maternal: 50,000 ppm
Note: Did not show teratogenic effects in animal experiments.
- Further information : Note: Acute Health Hazard Ethane, pentafluoro- (HFC-125): Cardiac sensitisation threshold (dog): 75000 ppm. 1,1,1-trifluoroethane (HFC-143a): Cardiac sensitisation threshold (dog): >250000 ppm. 1,1,1,2-tetrafluoroethane (HFC-134a): Cardiac sensitisation threshold (dog): 80000 ppm. Vapours are heavier than air and can cause suffocation by reducing oxygen available for breathing. Irritating to eyes and skin. Rapid evaporation of the liquid may cause frostbite. Avoid skin contact with leaking liquid (danger of frostbite). May cause cardiac arrhythmia. Chronic Health Hazard 1,1,1-trifluoroethane (HFC-143a): Not mutagenic in AMES Test.

SECTION 12. ECOLOGICAL INFORMATION

- Biodegradability
Pentafluoroethane : Result: Not readily biodegradable.
Value: 5 %
Method: OECD 301 D

Further information on ecology

- Additional ecological information : This product is subject to U.S. Environmental Protection Agency Clean Air Act Regulations at 40 CFR Part 82. This product contains greenhouse gases which may contribute to global warming. Do NOT vent to the atmosphere. To comply with provisions of the U.S. Clean Air Act, any

SAFETY DATA SHEET



Genetron® 404A

000000009893

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

residual must be recovered.

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal methods : Observe all Federal, State, and Local Environmental regulations.

Note : This product is subject to U.S. Environmental Protection Agency Clean Air Act Regulations Section 608 in 40 CFR Part 32 regarding refrigerant recycling.

SECTION 14. TRANSPORT INFORMATION

DOT UN/ID No. : UN 3337
Proper shipping name : REFRIGERANT GAS R 404A
Class : 2.2
Packing group
Hazard Labels : 2.2

IATA UN/ID No. : UN 3337
Description of the goods : REFRIGERANT GAS R 404A
Class : 2.2
Hazard Labels : 2.2
Packing instruction (cargo aircraft) : 200
Packing instruction (passenger aircraft) : 200

IMDG UN/ID No. : UN 3337
Description of the goods : REFRIGERANT GAS R 404A
Class : 2.2
Hazard Labels : 2.2
EmS Number : F-C, S-V
Marine pollutant : no

SECTION 15. REGULATORY INFORMATION

Inventories

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

- US. Toxic Substances Control Act : On TSCA Inventory
- Australia. Industrial Chemical (Notification and Assessment) Act : On the inventory, or in compliance with the inventory
- Canada. Canadian Environmental Protection Act (CEPA). Domestic Substances List (DSL) : All components of this product are on the Canadian DSL.
- Japan. Kashin-Hou Law List : On the inventory, or in compliance with the inventory
- Korea. Toxic Chemical Control Law (TCCL) List : On the inventory, or in compliance with the inventory
- Philippines. The Toxic Substances and Hazardous and Nuclear Waste Control Act : On the inventory, or in compliance with the inventory
- China. Inventory of Existing Chemical Substances : On the inventory, or in compliance with the inventory
- NZIOC - New Zealand : On the inventory, or in compliance with the inventory

National regulatory information

- SARA 302 Components** : SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.
- SARA 313 Components** : SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.
- SARA 311/312 Hazards** : Acute Health Hazard
Sudden Release of Pressure Hazard

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

California Prop. 65 : This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

New Jersey RTK : 1,1,1-Trifluoroethane 420-46-2

WHMIS Classification : A: Compressed Gas
This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

Global warming potential : 3,784

Ozone depletion potential (ODP) : 0

SECTION 16. OTHER INFORMATION

	HMIS III	NFPA
Health hazard	: 1	2
Flammability	: 1	1
Physical Hazard	: 0	
Instability	:	0

Hazard rating and rating systems (e.g. HMIS® III, NFPA): This information is intended solely for the use of individuals trained in the particular system.

Further information

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a

Genetron® 404A**000000009893**

Version 2.6

Revision Date 06/04/2014

Print Date 10/20/2015

guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text. Final determination of suitability of any material is the sole responsibility of the user. This information should not constitute a guarantee for any specific product properties.

Changes since the last version are highlighted in the margin. This version replaces all previous versions.

Previous Issue Date 08/16/2012

Prepared by Honeywell Performance Materials and Technologies Product Stewardship Group

CERTIFIED MAIL-RETURN RECEIPT REQUESTED
7012 2920 0000 2036 5083

May 4, 2016

Mr. William F. Durham, Director
WV DEP-Division of Air Quality
601 57th Street S.E.
Charleston, West Virginia 25304

Dear Mr. Durham,

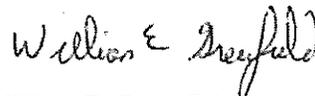
RE: Univation Technologies, LLC (UT)
South Charleston Catalyst Plant (SCCP)
Plant ID: 039-00618
Revised Notification of Compliance Status Report
40 CFR 63 Subpart FFFF, NESHAPs for Miscellaneous Organic Chemical Manufacturing Units

Federal regulations require the submission of information when there is a change in a previous submittal. The attached documents reflect changes to the OMU2 and OMU3 Processes.

Based upon information and belief formed after a reasonable inquiry, I, as a responsible official of the above-mentioned facility, certify the information contained in this report is true, accurate, and complete to the best of my knowledge. The above-mentioned affected source has complied with the relevant standard or and other applicable requirements referenced in the relevant standard.

If you have any questions, please contact Freddie Sizemore by at (304) 747-3713 or me at (304) 747-3131 (or by email: bgreenfield@univation.com).

Sincerely yours,



William E. Greenfield
Production Leader

cc: Ms. Zelma Maldonado, Associate Director (cover letter only)
Office of Air Enforcement and Compliance (3AP20)
U. S. Environmental Protection Agency, Region III
1650 Arch Street
Philadelphia, PA 19103-2029

CERTIFIED MAIL-RETURN RECEIPT REQUESTED
7012 2920 0000 2036 5038

Notification of Compliance Status (NOCS) Report

40 CFR 63 Subpart FFFF: National Emission Standards for Hazardous Air Pollutants: Miscellaneous Organic Chemical Manufacturing

**May 4, 2016
(Update to August 30, 2013 Submittal)**

Section I. General Information	5
A. General Information	5
B. Operating Scenarios	6
C. Recordkeeping Exemption	6
D. Changes to the Application for Approval of Construction or Reconstruction	7
Section II: Regulatory Overlap.....	8
A. Batch Process Vents Part of HON CMPU	8
B. Regulatory Overlap with 40 CFR parts 264 and 265, subparts AA, BB, and/or CC (Control Devices)	9
C. Regulatory Overlap with 40 CFR Part 264 / 265 Subpart BB (Equipment Leaks).....	9
D. Compliance with 40 CFR Part 60, Subpart Kb or 40 CFR Part 61, Subpart Y (Storage Tanks)	10
E. Compliance with Subpart I, GGG, or MMM (Equipment Leaks).....	11
F. Compliance with Subpart GGG (Pharma MACT) for Wastewater	12
G. Compliance with Subpart MMM (Pesticides MACT) for Wastewater	12
H. Compliance with other regulations for wastewater	13
I. Compliance with 40 CFR 60, Subparts DDD, III, NNN, or RRR (Process Vents).....	14
J. Compliance with 40 CFR 61, Subpart BB (Transfer racks)	15
K. Compliance with 40 CFR 61, Subpart FF (Wastewater)	16
L. Compliance with 40 CFR 60, Subpart VV and 40 CFR 61, Subpart V (Equipment Leaks)	17
M. Applicability of Process Units Included in a Process Unit Group	18
N. Hierarchy Approach	20
Section III. Continuous Process Vents.....	21
A.1. Summary of All Applicable Continuous Process Vents	21
A.2 Group 2 Continuous Process Vents with a TRE \geq 1.9 but $<$ 5.0 for existing sources ($<$ 8.0 for new sources)	22
B. Summary of Exempt Continuous Process Vents	22
Section IV. Batch Process Vents	23
A. Summary of Applicable Batch Process Vents.....	23
B. Summary of Exempt Batch Process Vents	24
C. Non-Reactive HAP Usage Alternative	24
D. Group 2 Batch Process Vents – Total Uncontrolled Emissions $<$ 1,000 Lb/Yr – Reduced Recordkeeping	25
E. Process Condensers vs. Control Devices for Batch Process Vents / Initial Compliance Demonstration	26
F. Biofilters for Batch Process Vents.....	27

G. Results of Emission Profiles.....	28
H. Descriptions of worst-case operating and/or testing conditions for control devices for Batch Process Vents	29
Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP	30
A. Summary of Process Vents that Emit Hydrogen Halide and Halogen HAP.....	30
B. Using Engineering Assessment to Calculate Uncontrolled Hydrogen Halide / Halogen HAP Emissions.....	31
Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers.....	32
A. Summary of Applicable Storage Tanks	32
B. Summary of Exempt Storage Tanks, Surge Control Vessels, or Bottoms Receivers	33
C. Predominant Use Determination for Storage Tanks	34
D. Group 1 Storage Tanks Using Vapor Balancing Option.....	35
Section VII. Transfer Racks.....	36
A. Summary of Applicable Transfer Racks	36
B. Predominant Use Determination for Transfer Racks	37
Section VIII. Equipment Leaks – HON Subpart H	38
A. Component Count / Method of Compliance.....	38
B. Planned Schedule for Each Phase – Pumps and Valves.....	40
C. Batch Process Pressure Testing Alternative §63.178(b)	41
D. Alternative for Enclosed-Vented Process Units §63.179	41
E. Control Devices for Equipment Leaks	42
F. Other Alternative Means of Emission Limitation (General) §63.177	42
Section IX. Process Wastewater	43
A. Summary of Applicable Process Wastewater Streams.....	43
B. Summary of Exempt Process Wastewater Streams	44
C. Waste Management Unit Information	45
D. Treatment Process Information.....	46
E. Information on Residuals.....	47
F. Initial Compliance Demonstration – Control Devices Controlling Vent Emissions from WMUs.....	49
G. Fixed Roofs, Covers and Enclosures	51
Section X. Maintenance Wastewater	52
A. Summary of Applicable Maintenance Wastewater Streams	52
B. Summary of Exempt Maintenance Wastewater Streams.....	52
Section XI. Liquid Streams in Open Systems	53

A. Summary of Equipment Handling Liquid Streams in Open Systems.....	53
B. Summary of Equipment Exempt from the Requirements for Liquid Stream in Open Systems	54
Section XII. Heat Exchange Systems	55
A. Summary of Applicable Heat Exchange Systems.....	55
B. Summary of Exempt Heat Exchange Systems	55
Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process.....	56
A. General Information	56
B. Routing Emissions to a Process or Fuel Gas System.....	57
C. Routing Emissions from Storage Tank and Low Throughput Transfer Racks to a NonFlare Control Device and / or Halogen Reduction Device	58
D. Routing Emissions from Process Vent and Transfer Racks (Excluding Low Throughput) to a Nonflare Control Device and/or Halogen Reduction Device.....	59
E. Routing Emissions to a Flare.....	60
F. Recovery Devices for Maintaining TRE above a Specified Level.....	61
Section XIV. Continuous Emissions Monitoring Systems (CEMS)	62
A. CEMS Performance Evaluation.....	62
B. Alternative Standard.....	62

Section I. General Information

A. General Information

Print or type the following information for each facility for which you are making notification of compliance status:

Operating Permit Number (OPTIONAL)		Facility I.D. Number (OPTIONAL)	
		03-54-03900618	
Owner or Operator Name / Title (e.g. Responsible Official)		Phone number	
William E. Greenfield/Production Leader		(303) 747-3131	
Mailing Address of Owner or Operator			
P. O. Box 8361 Building 300			
City	State	ZIP Code	
South Charleston	West Virginia	25303	
Facility Name			
Univation Technologies LLC South Charleston Catalyst Plant: OMU2 Process			
Facility Street Address (If different than Responsible Official's Mailing Address)			
1100 Science Park Drive South Charleston, West Virginia			
Facility Local Contact Name (to whom inquiries should be addressed)		Title	Phone
Freddie A. Sizemore		Environmental Specialist	(304) 747-3713
City	State	ZIP Code	
South Charleston	West Virginia	25303	

MCPU Report

Control Device Only Report – Complete Sections II.B, VIII, IX.D, IX.F, XIII, XIV, as applicable.

Continued on next page

Section I. General Information, Continued

B. Operating Scenarios

Attach a description of each operating scenario for the MCPU:

Note: Much of the information required to be documented for operating scenarios as specified in 63.2525(b) is located in other parts of this Notification of Compliance Status. In the "Description of Operating Scenarios" form, corresponding sections in the NOCS are provided.

Operating Scenario Description	Attachment #
OMU2 Normal Operation	Attachment OMU2-01
OMU2 Stand-by Operation	Attachment OMU2-02
OMU2 Wash Operation	Attachment OMU2-03

[63.2520(d)(2)(iv), 63.2525(b)]

C. Recordkeeping Exemption

Section 63.2525(e)(1) provides a recordkeeping exemption for each process with:

- Group 2 batch process vents or
- uncontrolled hydrogen halide and halogen HAP emission from the sum of all batch and continuous process vents < 1,000 lb/yr.

for any of the situations described below as long as this documentation is included in the notification of compliance status.

Indicate if any of the situations described below apply to your MCPU:

- Not Applicable
- The MCPU does not process, use or generate HAP.
- Group 2 batch process vents are controlled using a flare that meets the requirements of §63.987.
- Group 2 batch process vents are controlled using a control device for which the determination of worst case for initial compliance includes the contribution of all Group 2 batch process vents.

[63.2525(e)(1)]

Continued on next page

Section I. General Information, Continued

D. Changes to the Application for Approval of Construction or Reconstruction

Section 63.5(d)(1)(iii) of Subpart A requires that if an owner or operator submits estimates or preliminary information in place of the actual emissions data and analysis required in the application for approval of construction or reconstruction, then the actual, measured emission data and other correct information shall be submitted as soon as available but not later than with the notification of compliance status.

Did you submit an application for construction or reconstruction under §63.5(d) that contained preliminary or estimated data?

<input type="checkbox"/> Yes	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Not applicable - No construction or reconstruction occurred on or after 4/4/02.
------------------------------	-----------------------------	---

If you answered yes and if any of the information is substantially different upon startup of the project, THEN resubmit the updated information with the Notification of Compliance Status.

<input type="checkbox"/> Applicable	The information supplied in the Application for Approval of construction or Reconstruction is not substantially different upon startup of the project.
<input type="checkbox"/> Applicable.	See Attachment _____ for the revised information. (Attach a Supplemental Application for Approval of Construction or Reconstruction)

[§63.5(d)(1)(iii), (d)(1)(ii)(H), (d)(2), 63.9(h)(5)]

Section II: Regulatory Overlap

Introduction

For any equipment, emission stream, or wastewater stream subject to the MON and another federal rule, you may elect to comply only with the provisions as specified in this section. You also must identify the subject equipment, emission stream, or wastewater stream, and the provisions with which you will comply.

Check all options that apply and list the specific stream and the rule that you will follow in the table below.

[63.2520(d)(2)(vi), 63.2535]

A. Batch Process Vents Part of HON CPU

If you have an MCPU that includes a batch process vent that also is part of a CPU as defined in HON, 40 CFR 63 Subparts F and G, you must:

- Comply with the emission limits; operating limits; work practice standards; and the compliance, monitoring, reporting, and recordkeeping requirements for batch process vents in the MON, and
- Continue to comply with the requirements in subparts F, G, and H of this Part 63 that are applicable to the CPU and associated equipment.

[63.2535(a)(1)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have a batch process vent that is part of a HON CPU.
<input type="checkbox"/> Applicable	The MCPU includes batch process vent(s) that is(are) also part of a HON CPU. This(These) batch process vent(s) will comply with the emission limits; operating limits; work practice standards; and the compliance, monitoring, reporting, and recordkeeping requirements for batch process vents in 40 CFR 63 Subpart FFFF. The process unit will also continue to comply with HON Subparts F, G, and H that are applicable to the CPU and associated equipment. Identify batch process vents below: •

Continued on next page

Section II: Regulatory Overlap, Continued

B. Regulatory Overlap with 40 CFR parts 264 and 265, subparts AA, BB, and/or CC (Control Devices)

Identify which compliance option has been chosen for any control device subject to MON that is also subject to RCRA - 40 CFR part 264 / 265, subpart AA, BB, or CC.

[63.2535(b)(1)]

<input checked="" type="checkbox"/> Not Applicable	40 CFR 264 / 265 Subparts AA, BB, or CC are not applicable to any control devices used to comply with MON.
<input type="checkbox"/> Applicable	<i>Option 1:</i> The control device { } will comply with the monitoring, recordkeeping, and reporting requirements of the MON, 40 CFR 63 Subpart FFFF.
<input type="checkbox"/> Applicable	<i>Option 2:</i> The control device { } will comply with the monitoring and recordkeeping requirements in 40 CFR part 264 or 265 and the reporting requirements in 40 CFR part 264, which shall constitute compliance with the monitoring, recordkeeping and reporting requirements of the MON, 40 CFR 63 Subpart FFFF. All excursions will be reported as required by §63.2520(e).

C. Regulatory Overlap with 40 CFR Part 264 / 265 Subpart BB (Equipment Leaks)

Identify which compliance option has been chosen for equipment that is subject to MON and also subject to 40 CFR 264, subpart BB or to 40 CFR part 265, subpart BB (RCRA BB).

[63.2535(b)(2), 264/265.1064(m)]

<input checked="" type="checkbox"/> Not Applicable	40 CFR 264 / 265 Subparts BB is not applicable to any equipment subject to MON.
<input type="checkbox"/> Applicable	Equipment in the MON MCPU will comply with both MON, 40 CFR 63 Subpart FFFF, and continue to comply with the recordkeeping and reporting requirements of 40 CFR parts 264 and/or 265.
<input type="checkbox"/> Applicable	Compliance with the recordkeeping and reporting requirements of 40 CFR parts 264 and/or 265 is used to comply with the recordkeeping and reporting requirements of the MON, to the extent that the requirements of 40 CFR parts 264 and/or 265 duplicate the requirements of the MON.
<input type="checkbox"/> Applicable	Some equipment within the MON MCPU is subject to both 40 CFR 264 or 265 Subpart BB and MON. As allowed by §264.1064(m) and §265.1064(m), the MON MCPU is electing to determine compliance with RCRA BB for this equipment by documentation of compliance with the MON.

Continued on next page

Section II: Regulatory Overlap, Continued

D. Compliance with 40 CFR Part 60, Subpart Kb or 40 CFR Part 61, Subpart Y (Storage Tanks)

Identify any storage tanks that are assigned to an MCPU and that are both controlled with a floating roof and in compliance with the provisions of either 40 CFR Part 60, subpart Kb or 40 CFR Part 61, Subpart Y.

You are in compliance with the MON if you have a storage tank with a fixed roof, closed-vent system, and control device in compliance with the provisions of either 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y, except that you must comply with the monitoring, recordkeeping, and reporting requirements in the MON.

Alternatively, if a storage tank assigned to an MCPU is subject to control under 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y, you may elect to comply only with the requirements for Group 1 storage tanks in the MON.

[63.2535(c)]

<input checked="" type="checkbox"/> Not Applicable	Process unit has no storage tanks or only Group 2 storage tanks.
<input type="checkbox"/> Not Applicable	Process unit has Group 1 storage tank(s) but none are subject to 40 CFR Part 60, subpart Kb or 40 CFR 61, subpart Y.
<input type="checkbox"/> Applicable	Process unit has a Group 1 storage tanks that are assigned to the MCPU and that are both controlled with a floating roof and in compliance with the provisions of either 40 CFR Part 60, subpart Kb or 40 CFR Part 61, Subpart Y. Compliance with these rules for floating roof tanks constitutes compliance with the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs and to which subpart the tanks is(are) subject. •
<input type="checkbox"/> Applicable	Process unit has Group 1 storage tank(s) with a fixed roof, closed-vent system, and control device in compliance with the provisions of either 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y. Compliance with either of the rules constitutes compliance with the MON, except the process unit will comply with the monitoring, recordkeeping, and reporting requirements in the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs and to which subpart the tanks is(are) subject. •
<input type="checkbox"/> Applicable	Process unit has Group 1 storage tank(s) subject to control under 40 CFR Part 60, subpart Kb or 40 CFR Part 61, subpart Y, but is electing to comply only with the requirements for Group 1 storage tanks in the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs: •

Continued on next page

Section II: Regulatory Overlap, Continued

E. Compliance with Subpart I, GGG, or MMM (Equipment Leaks)

Identify the compliance option chosen if you have a MON affected source with fugitive equipment (e.g. pumps, compressors, agitators, valves, etc.) subject to 40 CFR 63 Subparts I, GGG, or MMM.

[63.2535(d)]

<input checked="" type="checkbox"/> Not Applicable	<p>Process unit has no equipment subject to:</p> <ul style="list-style-type: none"> • 40 CFR 63 Subpart I (National Emission Standards for Organic Hazardous Air Pollutants for Certain Processes Subject to the Negotiated Regulation for Equipment Leaks) • 40 CFR 63, Subpart GGG (Pharma MACT), or • 40 CFR 63, Subpart MMM (Pesticides Active Ingredient Production MACT)
<input type="checkbox"/> Applicable	<p>Process unit has equipment subject to subject to 40 CFR 63 Subparts I, GGG (Pharma MACT), or MMM (Pesticides Active Ingredient Production MACT).</p> <p><input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart I. Equipment within the MCPU will comply with the provisions of 40 CFR 63 Subpart H as referenced by 40 CFR 63, Subpart I.</p> <p><input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart GGG. Equipment within the MCPU will comply with the provisions of 40 CFR 63, Subpart GGG.</p> <p><input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart MMM. Equipment within the MCPU will comply with the provisions of 40 CFR 63, Subpart MMM.</p> <p><input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart I, GGG, or MMM. However, equipment within the MCPU will comply with the provisions of MON, 40 CFR 63, Subpart FFFF.</p>

Continued on next page

Section II: Regulatory Overlap, Continued

F. Compliance with Subpart GGG (Pharma MACT) for Wastewater

Identify which compliance option is chosen if you have an affected source subject to MON, 40 CFR 63, Subpart FFFF, and you have an affected source that generates wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT).

[63.2535(e)]

<input checked="" type="checkbox"/> Not Applicable	MCPU has no wastewater subject to 40 CFR 63, Subpart GGG (Pharma MACT).
<input type="checkbox"/> Not Applicable	MCPU does not generate wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT).
<input type="checkbox"/> Applicable	MCPU does generate wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT). MCPU is electing to comply with the provisions of MON, 40 CFR 63 subpart FFFF for all such wastewater streams. Identify wastewater streams below: •

G. Compliance with Subpart MMM (Pesticides MACT) for Wastewater

Identify which compliance option is chosen if you have an affected source subject to MON, 40 CFR 63, Subpart FFFF and you have an affected source that generates wastewater streams that meet the applicability thresholds specified in §63.1362(d) of 40 CFR 63 Subpart MMM (Pesticides Active Ingredient Production MACT).

[63.2535(f)]

<input checked="" type="checkbox"/> Not Applicable	MCPU has no wastewater subject to 40 CFR 63 Subpart MMM (PAIP MACT).
<input type="checkbox"/> Not Applicable	MCPU does not generate wastewater streams that meet the applicability thresholds specified in §63.1362(d) of 40 CFR 63 Subpart MMM (PAIP MACT).
<input type="checkbox"/> Applicable	MCPU does generate wastewater streams that meet the applicability thresholds specified in §§63.1362(d) of 40 CFR 63 Subpart MMM (PAIP MACT). MCPU is electing to comply with the provisions of MON, 40 CFR 63 subpart FFFF for all such wastewater streams (except that the 99 percent reduction requirement for streams subject to §63.1362(d)(10) still applies). Identify wastewater streams below: •

Continued on next page

Section II: Regulatory Overlap, Continued

H. Compliance with other regulations for wastewater

For Group 1 wastewater stream(s) that is(are) also subject to provisions in 40 CFR parts 260 through 272, identify the more stringent provisions of 40 CFR parts 260 through 272 with which you will comply and report the information and procedures used to make any stringency determinations.

[63.2535(g)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any Group 1 process wastewater streams.																				
<input type="checkbox"/> Not Applicable	The MCPU does have Group 1 process wastewater streams under the MON, but the wastewater stream(s) is(are) not subject to the provisions of 40 CFR parts 260 through 272.																				
<input type="checkbox"/> Applicable	{Identify Wastewater Stream} is a Group 1 process wastewater stream that is also subject to the provisions in 40 CFR parts 260 through 272. However, owner or operator of the MCPU is not electing to determine the more stringent requirements and will comply with both the provisions of 40 CFR parts 260 through 272 and the MON.																				
<input type="checkbox"/> Applicable -	<p>{Identify Wastewater Stream} is a Group 1 process wastewater stream that is also subject to the provisions in 40 CFR parts 260 through 272. The owner or operator of the MCPU is electing to comply with the following provisions of 40 CFR parts 260 through 272 that are determined to be more stringent than the requirements of MON.</p> <p>See attachment # ____ for information and procedures used to make stringency determinations.</p> <table border="1" data-bbox="760 1262 1430 1614"> <thead> <tr> <th rowspan="2">Requirements</th> <th colspan="2">More Stringent Requirements</th> </tr> <tr> <th>40 CFR Parts 260 through 272</th> <th>40 CFR 63 Subpart FFFF</th> </tr> </thead> <tbody> <tr> <td>Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)</td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td>Testing</td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td>Monitoring</td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td>Recordkeeping</td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td>Reporting</td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </tbody> </table>	Requirements	More Stringent Requirements		40 CFR Parts 260 through 272	40 CFR 63 Subpart FFFF	Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)	<input type="checkbox"/>	<input type="checkbox"/>	Testing	<input type="checkbox"/>	<input type="checkbox"/>	Monitoring	<input type="checkbox"/>	<input type="checkbox"/>	Recordkeeping	<input type="checkbox"/>	<input type="checkbox"/>	Reporting	<input type="checkbox"/>	<input type="checkbox"/>
Requirements	More Stringent Requirements																				
	40 CFR Parts 260 through 272	40 CFR 63 Subpart FFFF																			
Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)	<input type="checkbox"/>	<input type="checkbox"/>																			
Testing	<input type="checkbox"/>	<input type="checkbox"/>																			
Monitoring	<input type="checkbox"/>	<input type="checkbox"/>																			
Recordkeeping	<input type="checkbox"/>	<input type="checkbox"/>																			
Reporting	<input type="checkbox"/>	<input type="checkbox"/>																			

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Section II: Regulatory Overlap, Continued

**I. Compliance with
 40 CFR 60,
 Subparts DDD, III,
 NNN, or RRR
 (Process Vents)**

Identify which compliance option is chosen if you have an MCPU that contains equipment subject to the provisions of the MON that are also subject to the provisions of 40 CFR Part 60, subpart DDD, III, NNN, or RRR.

[63.2535(h)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any equipment that is subject to the provisions of 40 CFR Part 60, subpart DDD, III, NNN, or RRR.
<input type="checkbox"/> Applicable	<p>The MCPU does have equipment that are subject to the provisions of MON that are also subject to the provisions of:</p> <p> <input type="checkbox"/> 40 CFR Part 60, subpart DDD, <input type="checkbox"/> 40 CFR Part 60, subpart III, <input type="checkbox"/> 40 CFR Part 60, subpart NNN, or <input type="checkbox"/> 40 CFR Part 60, subpart RRR. </p> <p>Select one:</p> <p> <input type="checkbox"/> The MCPU is electing to apply MON to all such equipment in the MCPU. <ul style="list-style-type: none"> • All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with MON, will be considered as if they were organic HAP. • Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart DDD, III, NNN, or RRR, as applicable. </p> <p> <input type="checkbox"/> The MCPU is not electing to supersede NSPS DDD, III, NNN, RRR with the MON and will comply with both MON and the applicable NSPS subpart. </p>
<input type="checkbox"/> Applicable	<p>The MCPU does have equipment that are not subject to the provisions of MON, but are subject to the provisions of:</p> <p> <input type="checkbox"/> 40 CFR Part 60, subpart DDD, <input type="checkbox"/> 40 CFR Part 60, subpart III, <input type="checkbox"/> 40 CFR Part 60, subpart NNN, or <input type="checkbox"/> 40 CFR Part 60, subpart RRR. </p> <p>Select one:</p> <p> <input type="checkbox"/> The MCPU is electing to comply with the requirements for Group 1 process vents in the MON for such equipment. <ul style="list-style-type: none"> • All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with MON, will be considered as if they were organic HAP. • Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart DDD, III, NNN, or RRR, as applicable. </p> <p> <input type="checkbox"/> The MCPU is electing to comply only with the requirements of 40 CFR 60, subparts DDD, III, NNN and/or RRR. </p>

Continued on next page

Section II: Regulatory Overlap, Continued

J. Compliance with 40 CFR 61, Subpart BB (Transfer racks)

1. Identify any Group 1 transfer rack that is also subject to the provisions of 40 CFR Part 61, subpart BB. Group 1 transfer racks are required to comply only with MON.

Not Applicable – There are no Group 1 transfer racks.

Not Applicable – There are Group 1 transfer rack(s), but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable - There are Group 1 transfer rack(s) that are also subject to the provisions of 40 CFR Part 61, Subpart BB. These transfer rack(s) will comply only with the MON.

[63.2535(i)(1)]

2. Identify the compliance option chosen for any Group 2 transfer rack that is also subject to the control requirements of 40 CFR Part 61, subpart BB.

Not Applicable – There are no Group 2 transfer racks.

Not Applicable – There are Group 2 transfer rack(s), but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable – There are Group 2 transfer rack(s) that is(are) subject to the control requirements specified in §61.302 of 40 CFR Part 61, subpart BB. The MCPU is electing to comply with:

The requirements of 40 CFR Part 61, subpart BB, or

The requirements for Group 1 transfer racks under MON, Subpart FFFF.

[63.2535(i)(2)(i)]

3. Identify the compliance option chosen for any Group 2 transfer rack that is subject only to the reporting and recordkeeping requirements of 40 CFR Part 61, subpart BB.

Not Applicable – There are no Group 2 transfer racks.

Not Applicable – There are Group 2 transfer rack(s) but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable – There are Group 2 transfer rack(s) that is(are) subject to only to reporting and recordkeeping requirements specified under 40 CFR Part 61, subpart BB. The MCPU is complying:

Only with the requirements of the MON for Group 2 transfer racks and is exempt from the reporting and recordkeeping requirements in 40 CFR Part 61, subpart BB.

[63.2535(i)(2)(ii)]

Continued on next page

Section II: Regulatory Overlap, Continued

K. Compliance with 40 CFR 61, Subpart FF (Wastewater)

Identify which compliance option is chosen for a Group 1 or Group 2 wastewater stream that is also subject to the provisions of 40 CFR 61.342(c) through (h) (NESHAP FF), and is not exempt under 40 CFR 61.342(c)(2) or (3).

[63.2535(j)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any Group 1 or Group 2 wastewater streams.
<input type="checkbox"/> Not Applicable	The MCPU has Group 1 or Group 2 wastewater streams, but these streams (this stream) is not subject to the provisions of 40 CFR 61.342(c)-(h) of Subpart FF.
<input type="checkbox"/> Applicable	<p>The MCPU has Group 1 or Group 2 wastewater streams, that is(are) also subject to the provisions of 40 CFR 61.342(c) through (h).</p> <p><input type="checkbox"/> The MCPU is electing to comply only with the requirements for Group 1 wastewater streams in this subpart FFFF.</p> <p><input type="checkbox"/> The MCPU is electing to comply with both the requirements for Group 1 wastewater streams in this subpart FFFF and the requirements in 40 CFR 61, Subpart FF. List Group 1 wastewater streams complying with this option:</p> <ul style="list-style-type: none"> • <p><input type="checkbox"/> The MCPU has a Group 2 wastewater stream that is exempted from 40 CFR 61.342(c)(1) under 40 CFR 61.342(c)(2) or (3), and is required to comply only with the reporting and recordkeeping requirements specified in the MON for Group 2 wastewater streams, and is exempt from the requirements in 40 CFR Part 61, subpart FF. List Group 2 wastewater streams complying with this option:</p> <ul style="list-style-type: none"> •

Continued on next page

Section II: Regulatory Overlap, Continued

L. Compliance with 40 CFR 60, Subpart VV and 40 CFR 61, Subpart V (Equipment Leaks)

Identify which compliance option is chosen if you have an affected source with equipment that subject to MON and that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Not Applicable – The MCPU does not have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Applicable – The MCPU does have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. However, the MCPU will apply both MON and 40 CFR Part 60, subpart VV or Part 61, subpart V, as applicable.

Applicable – The MCPU does have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. The MCPU is electing to apply MON to all such equipment.

- All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with the MON, are considered as if they were organic HAP.
- Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart VV and 40 CFR Part 61, subpart V, as applicable.

[63.2535(k)]

Identify which compliance option is chosen if you have an affected source with equipment to which **MON does not apply**, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Not Applicable – The MCPU does not have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Applicable – The MCPU does have equipment to which MON does not apply, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. However, the MCPU will only apply 40 CFR Part 60, subpart VV or Part 61, subpart V to such equipment, as applicable.

Applicable – The MCPU does have equipment to which MON does not apply, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. The MCPU will elect to apply MON to all such equipment.

- All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with the MON, are considered as if they were organic HAP.
- Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart VV and 40 CFR Part 61, subpart V, as applicable.

[63.2535(k)]

Continued on next page

Section II: Regulatory Overlap, Continued

M. Applicability of Process Units Included in a Process Unit Group

Identify which compliance option is chosen if the MCPU consists of nondedicated equipment that will operate on or after November 10, 2003 and for which the process unit group (PUG) option is chosen.

If the primary product of a process unit group (PUG) is determined to be material described in §63.2435(b)(1) (e.g. one that is subject to MON), then

- You must comply with the MON for each MCPU in the PUG.
- You may also elect to comply with MON for all other process units in the PUG, which constitutes compliance with other Part 63 rules.

If the primary product of the PUG is determined to be material not subject to MON, then you must comply with as follows:

- If the primary product is subject to subpart GGG of this Part 63, then comply with the requirements of subpart GGG for each MCPU in the PUG.
- If the primary product is subject to subpart MMM of this Part 63, then comply with the requirements of subpart MMM for each MCPU in the PUG.
- If the primary product is subject to any subpart in Part 63 other than subpart GGG or subpart MMM, then comply with the requirements of this subpart for each MCPU in the PUG.

[63.2535(l), 63.2520(d)(2)(ix)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU consists of only dedicated equipment subject to MON.
<input type="checkbox"/> Not Applicable	The MCPU consists of nondedicated equipment that will operate on or after November 10, 2003; however, the process unit group (PUG) option will not be used.
<input type="checkbox"/> Applicable -	The MCPU consists of nondedicated equipment that will operate on or after November 10, 2003 that is also used within other nondedicated MCPU or other nondedicated processes expected to be operated in the 5 years after November 10, 2003. The following information identifies the applicable process unit group. Note: If choosing this option, then the NOCS for the applicable regulation should be amended to include the MCPU.

Continued on next page

Section II: Regulatory Overlap, Continued

M. Applicability of Process Not Applicable
 Units Included in a
 Process Unit Group
 (continued)

Process unit group:	
Primary product:	
Primary product is subject to: (specify which subpart)	<input type="checkbox"/> MON (40 CFR 63, subpart FFFF) <input type="checkbox"/> Pharma MACT (40 CFR 63, subpart GGG) or <input type="checkbox"/> Pesticides MACT (40 CFR 63, subpart MMM). <input type="checkbox"/> Another Part 63 Subpart not listed above.
Process unit group will comply with (specify which one):	<input type="checkbox"/> MON (40 CFR 63, subpart FFFF) <input type="checkbox"/> Pharma MACT (40 CFR 63, subpart GGG) or <input type="checkbox"/> Pesticides MACT (40 CFR 63, subpart MMM).
Attachment # for the primary product determination.	
<p>Note:</p> <ul style="list-style-type: none"> The primary product is the type of product (e.g., organic chemicals subject to §63.2435(b)(1), pharmaceutical products subject to §63.1250, or pesticide active ingredients subject to §63.1360) expected to be produced for the greatest operating time in the 5-year period specified in paragraph (l)(1)(ii) of this section. If the PUG produces multiple types of products equally based on operating time, then the primary product is the type of product with the greatest production on a mass basis over the 5-year period specified in paragraph (l)(1)(ii) of this section. At a minimum, you must redetermine the primary product of the PUG following the procedure specified in paragraphs (l)(2)(i) and (ii) of this section every 5 years. You must record the calculation of each redetermination of the primary product as specified in §63.2525(i)(5) and report the calculation in a compliance report submitted no later than the report covering the period for the end of the 5th year after cessation of production of the previous primary product, as specified in §63.2520(e)(8). 	

Continued on next page

Section II: Regulatory Overlap, Continued

N. Hierarchy Approach

Select which option you are using below when organic HAP emissions from different emission types (e.g., continuous process vents, batch process vents, storage tanks, transfer operations, and waste management units) are combined. If applicable, you must comply with the requirements of either options 1 or 2 below:

- Not applicable** – All emission points are Group 2 – no control is required.
- Not applicable** – OHAP emissions from different emission types are not combined.
- Applicable - Option #1** - Comply with the applicable requirements of the MON for each kind of organic HAP emissions in the stream (e.g. comply with applicable requirements for continuous process vents, batch process vents, storage tanks, transfer operations, and waste management units).
- Applicable - Option #2** - Determine the applicable requirements based on the hierarchy presented below. For a combined stream, the applicable requirements are specified in the highest-listed row in the hierarchy that applies to any of the individual streams that make up the combined stream. **Note:** You must comply with applicable monitoring, recordkeeping, and reporting requirements for the highest-listed emission point type.

Hierarchy	Emission Point Type
1	Group 1 batch process vents
2	Continuous process vent routed to a control device
3	Transfer Operations
4	Waste Management Units used to manage and treat Group 1 wastewater streams and residuals removed from Group 1 wastewater streams
5	Storage Tanks
6	Continuous process vents after a recovery device

<p>If using Option #2, provide brief explanation of approach used:</p>	<p><i>[Example: MCPU has two designated Group 1 continuous vents and a vent from two Group 1 storage tanks aggregated with a Group 1 batch process vent. The combined stream will comply with the applicable monitoring, recordkeeping and reporting requirements for Group 1 batch process vents.]</i></p>
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[63.2450(c), 63.982(f)]

Section III. Continuous Process Vents

Introduction

This section provides the results of any continuous process vent applicability determinations, emission calculations, or analyses used to identify and quantify HAP emissions from the affected source.

A.1. Summary of All Applicable Continuous Process Vents

Complete the following table listing all continuous process vents and their corresponding control methods.

Not Applicable

(1) Continuous Process Vent ID	(2) Process Vent Description (From where does the process vent originate?)	(3) Existing or New Affected Source?	(4) HAPs Ventted	(5) Designated as Group 1 Continuous Process Vent? (Yes / No)	(6) Aggregated with and complying as a Group 1 Batch Process Vent?	(7) Total Resource Effectiveness Index Value (Mark "N/A" if Vent Stream is designated as Group 1)	(8) Flow Rate (scmm) (Mark "N/A" if Vent Stream is designated as Group 1)	(9) Group 1 or Group 2 Process Vent?
K06/E325 (Vents to flare per WVDAQ Permit R13-2631)	Product Separation/Solvent Recovery Condenser	Existing (Operating Scenario OMU2-01)	Toluene	No	No	1.97	0.29	Group 2
K06/E325 (Vents to flare per WVDAQ Permit R13-2631)	Product Separation/Solvent Recovery Condenser	Existing (Operating Scenario OMU2-02)	Toluene	No	No	> 5.0	0.05	Group 2

For Group 1 Continuous Process Vents Only (and complete Section XIII as appropriate):

Not Applicable

(1) Continuous Process Vent ID	(10) Control Option Selected for HAP Emissions	(11) Control Device Type, if applicable	(12) Control Device ID, if applicable	(13) Is vent stream from continuous process vent halogenated, and are you using a combustion control device to control HAP emissions	(14) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section III. Continuous Process Vents, Continued

A.2 Group 2 Continuous Process Vents with a TRE ≥ 1.9 but < 5.0 for existing sources (< 8.0 for new sources)

Not Applicable

(1) Continuous Process Vent ID	(2) Recovery Device Type, if applicable	(3) Recovery Device ID, if applicable
E-325 (Operating Scenarios OMU2-01 and OMU2-02) Vents to flare per Permit R13-2631A	Condenser	E-325

B. Summary of Exempt Continuous Process Vents

Complete the following table listing all exempt continuous process vents.

Not Applicable

(1) Process Vent ID	(2) Exemption Reason

Section IV. Batch Process Vents

Introduction

This section provides the results of any batch process vent applicability determinations, emission calculations, or analyses used to identify and quantify HAP emissions from the affected source.

A. Summary of Applicable Batch Process Vents

Complete the following table listing all batch process vents and their corresponding control methods.

Not Applicable

(1) Batch Process Vent ID	(2) Existing or New Affected Source?	(3) HAPs Vented	(4) Designated as Group 1 Batch Process Vent (Yes / No)	(5) Uncontrolled Organic HAP Emissions from Vent (Lb/yr) if not designated as a Group 1 Batch Process Vent	(6) Group 1 or Group 2 Batch Process Vent
K04, K05, K18, K20 Header (vents to flare, L15) (Emission Point AF4)	Existing	Toluene 2,2,4-Trimethylpentane	No	1,425	Group 2
K05 (vent to air, AT3)	Existing	Toluene	No	932	Group 2
Total Uncontrolled OHAP Emissions (Lb/Yr):				2,357	

For Group 1 Batch Process Vents Only (and complete Section XIII as appropriate):

Not Applicable

(1) Batch Process Vent ID	(7) Control Option Selected for HAP Emissions	(8) Control Device Type, if applicable	(9) Control Device ID, if applicable	(10) Is vent stream from batch process vent halogenated and are you using a combustion control device to control HAP emissions	(11) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section IV. Batch Process Vents, Continued

B. Summary of Exempt Batch Process Vents

Complete the following table listing all exempt batch process vents.

Not Applicable

(1) Batch Process Vent ID	(2) Batch Process Vent Exemption
KXX (vent to air ATX)	Vent stream from flexible elephant truck system that draws ambient air away from operators when drums are open.

C. Non-Reactive HAP Usage Alternative

As an alternative to determining the uncontrolled HAP emissions as specified in 63.1257(d)(2)(i)-(ii) [Pharma MACT], you may elect to demonstrate that non-reactive organic HAP are the only HAP used in the process and non-reactive HAP usage in the process is less than 10,000lb/yr.

Not Applicable

If applicable, provide data and supporting rationale either in an attachment or in the space below explaining why the non-reactive organic HAP usage will be less than 10,000 lb/yr.

Attachment # _____

[63.2460(b)(7), 63.2525(e)(2)]

Continued on next page

Section IV. Batch Process Vents, Continued

D. Group 2 Batch Process Vents – Total Uncontrolled Emissions < 1,000 Lb/Yr – Reduced Recordkeeping

If the total uncontrolled organic HAP emission from batch process vents in a MCPU will be < 1,000 lb/yr for the anticipated number of standard batches, then §63.2525(e)(3) provides reduced recordkeeping (e.g. keep records of the number of batches operated and calculate a daily rolling annual sum of batches operated no less frequently than monthly).

- If the number of batches operated results in OHAP emissions that exceed 1,000 lb/yr, you must estimate emissions for the preceding 12 months based on the number of batches operated and the estimated emissions for a standard batch, and you must begin recordkeeping as required for other Group 2 batch process vents.
- After 1 year, you may revert to this reduced recordkeeping option if the number of batches operated during the year results in less than 1,000 lb/yr of OHAP emissions.

Indicate whether this reduced recordkeeping option applies to your MCPU.

Not Applicable

Applicable - The total uncontrolled organic HAP emission from batch process vents in a MCPU will be < 1,000 lb/yr for the anticipated number of standard batches. This MCPU will comply with the recordkeeping option provided in §63.2525(e)(3).

Description of standard batch	
Anticipated # of Standard Batches	
Total uncontrolled organic HAP emissions from batch process vents per batch (Lb/Batch)	
Total uncontrolled organic HAP emissions from batch process vents per year (Lb/Year)	

[§63.2525(e)(3)]

Continued on next page

Section IV. Batch Process Vents, Continued

E. Process Condensers vs. Control Devices for Batch Process Vents / Initial Compliance Demonstration	<p>List all condensers associated with batch process vents below and indicate whether the condenser is a control device for a batch process vent or a process condenser.</p> <p>Attach:</p> <ul style="list-style-type: none"> • supporting rationale as to why the condenser is a control device vs. a process condenser for a batch process vent and • the initial compliance demonstration for each process condenser. <p style="text-align: center;"><i>[\$63.2460(c)(1), (c)(2)(v), §63.1257(d)(2)(i)(C)(4)(ii), §63.1257(d)(3)(iii)(B)]</i></p>
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- Not Applicable - MCPU does not have any condensers associated with batch process vents.
- Applicable - MCPU has condensers associated with batch process vents that are either control devices or process condensers. See the table below.

Condenser ID	Process Condenser or Control Device?	Supporting Rationale as to Why Condenser is a Process Condenser or Control Device (Attachment #)	For process condensers, attach initial compliance demonstration (Attachment #)	For process condensers exempt from the initial compliance demonstration, indicate reason for exemption. See codes below.
F-400	Process Condenser	OMU2 E400 Cond Rationale Attachment #OMU2-01-2	OMU2 E400 Cond Rationale Attachment #OMU2-01-2	Not Applicable
Process Condensers – Exemptions from Initial Compliance Demonstration: A. Process condenser is followed by a secondary condenser that is an air pollution control device. B. Process condenser is followed by an air pollution control device that is meeting the alternative standard.				

Continued on next page

Section IV. Batch Process Vents, Continued

<p>F. Biofilters for Batch Process Vents</p>	<p>If you use a biofilter to meet either the 95% reduction requirement or outlet concentration requirement for batch process vents, THEN you may elect to:</p> <ul style="list-style-type: none"> • Monitor the biofilter bed temperature using multiple thermocouples in representative locations throughout the biofilter bed and • Calculate the average biofilter bed temperature across these thermocouples prior to reducing the temperature data to 15 minute (or shorter) averages for purposes of establishing operating limits for the biofilter. <p>If you use multiple thermocouples, include your rationale for their site selection this section.</p> <p style="text-align: right;"><i>[§63.2460(c)(9)(ii)(C)]</i></p>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have a biofilter.
<input type="checkbox"/> Not Applicable -	MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents, but the biofilter bed temperature is not monitored.
<input type="checkbox"/> Applicable -	MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents. The biofilter bed temperature is not monitored using multiple thermocouples.
<input type="checkbox"/> Applicable -	<p>MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents. The biofilter bed temperature is monitored using multiple thermocouples in representative locations throughout the biofilter bed.</p> <p>See Attachment # _____ for the rationale for their site selection.</p>

Continued on next page

Section IV. Batch Process Vents, Continued

G. Results of Emission Profiles	<p>Submit the results of emissions profiles for Group 1 batch process vents when you conduct a performance test or design evaluation for a non-flare control device used to control emissions from batch process vents.</p> <p>§63.2515(c) requires submittal of the emission profile with the notification of performance test (if performance testing is applicable) for any performance test required as part of the initial compliance procedures for batch process vents. The emission profile is also required to be submitted as part of the NOCS when you conduct a performance test or design evaluation for Group 1 batch process vents routed to a non-flare control device as specified in §63.2520(b)(2)(ii).</p> <p style="text-align: right;"><i>[§63.2460(b)(5), (c)(2)(ii), §63.2515(c), §63.2520(d)(2)(ii), §63.1257(b)(8)]</i></p>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have any Group 1 batch process vents.
<input type="checkbox"/> Not Applicable -	<p>MCPU does have Group 1 batch process vents but is either:</p> <p><input type="checkbox"/> Electing to comply with the alternative standard, §63.2505.</p> <p><input type="checkbox"/> Complying with the emission limits for batch process vents using a flare.</p> <p>OR</p> <p><input type="checkbox"/> Routing emissions to a control device that is exempt from performance testing under §§63.985(b)(2) or 63.988(b)(2) of Subpart SS. The control device(s) {Control Device IDs} is/are:</p> <p><input type="checkbox"/> A hazardous waste incinerator that has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, subpart O, or has certified compliance with the interim status requirements of 40 CFR part 265, subpart O;</p> <p><input type="checkbox"/> A boiler or process heater with a design heat input capacity of 44 megawatts (150 million British thermal units per hour) or greater;</p> <p><input type="checkbox"/> A boiler or process heater into which the vent stream is introduced with the primary fuel or is used as the primary fuel; or</p> <p><input type="checkbox"/> The boiler or process heater burns hazardous waste and has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H; or</p> <p><input type="checkbox"/> The boiler or process heater burns hazardous waste and has certified compliance with the interim status requirements of 40 CFR part 266, subpart H.</p>
<input type="checkbox"/> Applicable -	<p>MCPU does have Group 1 batch process vents routed to a non-flare control device. See Attachment # _____ for the:</p> <p><input type="checkbox"/> Emission profile by process</p> <p><input type="checkbox"/> Emission profile by equipment</p> <p><input type="checkbox"/> Emission profile by capture and control device limitation.</p> <p>Note: Attach Form: <u>Emission Profiles and Testing Conditions for Batch Process Vents.</u></p>

Continued on next page

Section IV. Batch Process Vents, Continued

H. Descriptions of worst-case operating and/or testing conditions for control devices for Batch Process Vents	<p>For each non-flare control device controlling emissions from Group 1 batch process vents, submit descriptions of worst-case operating and/or testing conditions for the design evaluation and/or performance test.</p> <p style="text-align: right;"><i>[§63.2520(d)(2)(v)]</i></p>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have any Group 1 batch process vents.
<input type="checkbox"/> Not Applicable -	MCPU does have Group 1 batch process vents but is either: <ul style="list-style-type: none"> <input type="checkbox"/> Electing to comply with the alternative standard. <input type="checkbox"/> Complying with the emission limits for batch process vents using a flare. OR <input type="checkbox"/> Routing emissions to a control device that is exempt from performance testing under §§63.985(b)(2) or 63.988(b)(2) of Subpart SS. The control device(s) {Control Device IDs} is/are: <ul style="list-style-type: none"> <input type="checkbox"/> A hazardous waste incinerator that has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, subpart O, or has certified compliance with the interim status requirements of 40 CFR part 265, subpart O; <input type="checkbox"/> A boiler or process heater with a design heat input capacity of 44 megawatts (150 million British thermal units per hour) or greater; <input type="checkbox"/> A boiler or process heater into which the vent stream is introduced with the primary fuel or is used as the primary fuel; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has certified compliance with the interim status requirements of 40 CFR part 266, subpart H.
<input type="checkbox"/> Applicable -	MCPU does have Group 1 batch process vents routed to a non-flare control device. See table below for a description of the absolute or hypothetical worst case conditions for each control device. Also refer to Section IV.G.for results of emission profiles and testing conditions for batch process vents for more detailed information.

Control Device ID:	
<input type="checkbox"/> Description of Absolute Worst Case Conditions –	
<input type="checkbox"/> Description of Hypothetical Worst Case Conditions –	

Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP

Introduction

This section provides the results of any applicability determinations, emission calculations, or analyses used to identify and quantify hydrogen halide and halogen HAP emissions (or emissions of HAP metals for new sources) from the affected source.

A. Summary of Process Vents that Emit Hydrogen Halide and Halogen HAP

List all continuous and batch process vents that emit hydrogen halide or halogen HAP. For new sources only, copy the table below but list HAP metals. Complete Section XIII as appropriate.

Note: Control is not required if uncontrolled hydrogen halide and halogen HAP emissions from process vents is < 1000 lb/yr.

Not Applicable

[§63.2465(b)]

(1) Process Vent ID	(2) Process Vent Description (From where does the process vent originate?)	(3) Batch Process Vent (BPV) or Continuous Process Vent (CPV)?	(4) Hydrogen halides and Halogen HAPs Vented	(5) Uncontrolled Mass Emission Rate of Hydrogen halide and Halogen HAP Emissions (Lb/yr) (HCl, HF, Cl2)	(6) Control Option Selected for Hydrogen Halide and Halogen HAP (or HAP metals for new sources)	(7) Control Device Type, if applicable	(8) Control Device ID, if applicable
	Total Uncontrolled Emission Rate of Hydrogen Halide / Halogen HAPs:						

Continued on next page

Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP, Continued

B. Using Engineering Assessment to Calculate Uncontrolled Hydrogen Halide / Halogen HAP Emissions

If opting to using engineering assessment to calculate the sum of uncontrolled hydrogen halide / halogen HAP emissions from each of the process vents within the process [§63.1257(d)(2)(i)] instead of the emission estimation procedures for batch vents [§63.1257(d)(2)(ii)], provide the data or other information supporting the finding that the emission estimation equations are inappropriate.

Not Applicable – Uncontrolled hydrogen halide / halogen HAP emissions are designated to be > 1,000 lb/yr without calculating emissions.

Not Applicable – The requirements for process vents that emit hydrogen halide and halogen HAP are not applicable to this MCPU.

Not Applicable – The requirements for process vents that emit hydrogen halide and halogen HAP are applicable to this MCPU, but the emission estimation procedures for batch vents in 63.1257(d)(2)(i) are used to calculate the uncontrolled emissions.

Applicable – Engineering assessment is used to calculate the sum of uncontrolled hydrogen halide / halogen HAP emissions from the process vents listed below. See the attached supporting information below.

[§63.2465(b), 63.1257(d)(2)(ii), (d)(2)(ii)(E)]

(1) Process Vent ID	(2) Data or other information supporting a finding that the emissions estimation equations are inappropriate.	(3) Engineering Assessment Attachment #

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers

Introduction

This section provides the results of any storage tank applicability determinations.

A. Summary of Applicable Storage Tanks

Complete the following table listing all storage tanks and their corresponding control methods. Also include surge control vessels and bottoms receivers that meet the capacity and vapor pressure thresholds for a Group 1 storage tank.

Not Applicable

(1) Storage Tank / Surge Control Vessel / Bottoms Receiver - Vessel ID	(2) Type of Tank (Storage Tank, Surge Control Vessel or Bottoms Receiver)	(3) HAPs Stored	(4) Actual Capacity (gallons)	(5) Actual Maximum True Vapor Pressure of Total HAP at Storage Temperature (psia)	(6) Actual Maximum True Vapor Pressure of Total HAP at Storage Temperature (kPa) - converted	(7) Existing or New Affected Source?	(8) Group 1 or Group 2 Storage Tank?

For Group 1 Storage Tanks or Surge Control Vessels / Bottoms Receivers Subject to Control Only (and complete Section XIII as appropriate):

Not Applicable

(1) Storage Tank / Vessel ID (contd.)	(9) Control Option Selected for HAP Emissions	(10) Control Device Type, if applicable	(11) Control Device ID, if applicable	(12) Is vent stream from storage tank halogenated and are you using a combustion control device to control HAP emissions	(13) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

B. Summary of Exempt Storage Tanks, Surge Control Vessels, or Bottoms Receivers

Complete the following table listing all exempt storage tanks and surge control vessels or bottoms receivers that are not subject to control.

Not Applicable

(1) Tank / Vessel ID	(2) Tank / Vessel Type (Storage Tank, Surge Control Vessel or Bottoms Receiver)	(3) HAPs or non-HAPs Stored	(4) Exemption Reason
K08	Surge Control Vessel	HAPs	Volume Less Than 10,000 gallons
SP1	Storage Tank	Non-HAPs	Material stored does not contain HAPs
SP2	Storage Tank	Non-HAPs	Material stored does not contain HAPs
SP6	Storage Tank	Non-HAPs	Material stored does not contain HAPs

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

C. Predominant Use Determination for Storage Tanks

For those storage tanks (including storage tanks in series) for which the predominant use varies from year to year, provide the predominant use determination in the table below or reference an attachment that includes the supporting information stating how the determination was made. *[§63.2435(d)]*

Applicability	Storage Tank ID	Description	Supporting Documentation (Attachment #)
<input checked="" type="checkbox"/> Not Applicable	N/A	The MCPU does not have any storage tanks.	
<input type="checkbox"/> Not Applicable		The storage tank is(are) dedicated to this MCPU.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This storage tank is shared among process units. The predominant use of the storage tank is associated with a miscellaneous organic chemical manufacturing process, and the storage tank is not a part of an affected source under another Part §63 subpart. Therefore, the storage tank is assigned to the MCPU for that process.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This storage tank is shared among process units. The predominant use cannot be determined. Therefore, the storage tank is assigned to any MCPU that shares it and is subject to the MON. MCPU: <input type="text"/>	No supporting documentation required.
<input type="checkbox"/> Applicable		This storage tank is shared among process units. Predominant use determination is based on utilization that occurred during the year preceding November 10, 2003. Primary use will be redetermined at least once every 5 years.	Attachment #
<input type="checkbox"/> Applicable		This storage tank is shared among process units. The storage tank was not in operation during the year preceding November 10, 2003. The predominant use determination is based on the expected use for the first 5-year period after startup. Primary use will be redetermined at least once every 5 years.	Attachment #

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

D. Group 1 Storage Tanks Using Vapor Balancing Option

If complying with the vapor balancing alternative for affected storage tanks (§63.2470(e)), list the specific tanks following the vapor balancing alternative and check all that apply.

Not Applicable – Not using the vapor balancing alternative in §63.2470(e) for Group 1 storage tanks.

Applicable – Using the vapor balancing alternative in §63.2470(e) for Group 1 storage tanks.

[§63.2520(d)(2)(viii), §63.2470(e), §63.1253(f)]

Storage Tank IDs	Check all that apply:
	<input type="checkbox"/> The pressure vent settings on the affected storage tanks are greater than or equal to 2.5 psig.
	<input type="checkbox"/> Electing to set a pressure relief device associated with these storage tanks to a value less than the 2.5 pounds per square inch gauge pressure (psig). The rationale explaining why the alternative value is sufficient to prevent breathing losses at all times is included in Attachment XX.
	<input type="checkbox"/> Using the vapor balancing alternative for Group 1 storage tanks. The reloading / cleaning facility uses: <ul style="list-style-type: none"> A closed-vent system and control device that reduces inlet emissions of HAP by 95% wt or greater and complies with the MON, §§§63.2445 through §63.2550. Note: The reporting requirements on §§63.2520 do not apply to the owner or operator of the offsite cleaning or reloading facility.
	<input type="checkbox"/> Using the vapor balancing alternative for Group 1 storage tanks. The reloading / cleaning facility uses: <ul style="list-style-type: none"> A vapor balancing system designed and operated to collect OHAP vapor displaced from the tank truck or railcar during reloading and routes the collected HAP vapor to the storage tank from which the liquid being transferred originated.
	<input type="checkbox"/> Using vapor balancing alternative for Group 1 storage tanks AND an offsite reloading or cleaning facility. Records and reports will be maintained by the offsite reloading or cleaning facility under {40 CFR §63 Subpart XXXX} as alternative to complying with the monitoring, recordkeeping, and reporting provisions in the MON, §§§63.2445 through §63.2550 as allowed by §§63.2535(a)(2).

Continued on next page

Section VII. Transfer Racks

Introduction

This section provides the results of any transfer rack applicability determinations.

A. Summary of Applicable Transfer Racks

Complete the following table listing all transfer racks and their corresponding control methods.

Not Applicable – Organic liquids containing OHAPs are not loaded into tank trucks and/or rail cars

(1) Transfer Rack ID	(2) Truck or Railcar?	(3) HAPs Loaded	(4) Rack Weighted Average Partial Pressure of Liquids Containing OHAP (psia)	(5) Annual Volume of Organic Liquid Loaded (Gallons/Year)	(6) Group 1 or Group 2 Transfer Rack?

For Group 1 Transfer Racks Only:

Not Applicable

(1) Transfer Rack ID, contd.	(7) Control Option Selected for HAP Emissions	(8) Control Device Type, if applicable	(9) Control Device ID, if applicable	(10) Is vent stream from transfer rack halogenated, and are you using a combustion control device to control HAP emissions	(11) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section VII. Transfer Racks, Continued

B. Predominant Use Determination for Transfer Racks

For those transfer rack loading arms for which the predominant use varies from year to year, provide the predominant use determination in the table below or reference an attachment that includes the supporting information stating how the determination was made. *[\$63.2435(d)]*

Applicability	Transfer Rack ID	Description	Supporting Documentation (Attachment #)
<input checked="" type="checkbox"/> Not Applicable	N/A	The MCPU does not have any transfer racks.	N/A
<input type="checkbox"/> Not Applicable		The transfer rack loading arm(s) is(are) dedicated to this MCPU.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This transfer rack loading arm is shared among process units. The predominant use of the transfer rack loading arm is associated with a miscellaneous organic chemical manufacturing process, and the loading arm is not a part of an affected source under another Part §63 subpart. Therefore, the loading arm is assigned to the MCPU for that process.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This transfer rack loading arm is shared among process units. The predominant use cannot be determined. Therefore, the transfer rack loading arm is assigned to any MCPU that shares it and is subject to the MON. MCPU: <input type="text"/>	No supporting documentation required.
<input type="checkbox"/> Applicable		This transfer rack loading arm is shared among process units. Predominant use determinations is based on utilization that occurred during the year preceding November 10, 2003. Primary use will be redetermined at least once every 5 years.	Attachment #
<input type="checkbox"/> Applicable		This transfer rack loading arm is shared among process units. The transfer rack was not in operation during the year preceding November 10, 2003. The predominant use determination is based on the expected use for the first 5-year period after startup. Primary use will be redetermined at least once every 5 years.	Attachment #

Section VIII. Equipment Leaks – HON Subpart H

A. Component Count / Method of Compliance

The table below includes the number of each equipment type excluding equipment in vacuum service and the method of the compliance with the standard.

Batch Process Pressure Testing Alternative Used

[§63.2520(d)(2)(vii), §63.182(c)(1)(ii)-(iii)]

Equipment Type	Number	Method of Compliance
Pumps in light liquid service:	0	§63.163(b) Monthly leak detection and repair
	0	§63.163(e) Dual mechanical seal system.
	0	§63.163(f) No externally actuated shaft.
	0	§63.163(g) Equipped with closed vent system.
	0	§63.163(h) Within boundary of an unmanned plant site.
	0	§63.163(j) Unsafe-to-monitor pumps. Monitor when safe.
	TOTAL:	NA
Compressors:	0	§63.164(a) Equipped with required seal system.
	0	§63.164(h) Equipped with closed vent system.
	0	§63.164(i) Operate at <500 ppm above background.
	TOTAL:	NA
Pressure relief devices in gas/vapor service:	3	§63.165(a) Operate at <500 ppm above background.
	0	§63.165(c) Routed to process / fuel gas or closed vent system
	1	§63.165(d) Equipped with upstream rupture disk.
	TOTAL:	4
Sampling connection systems:	0	§63.166(b)(1) Return purge to process line.
	0	§63.166(b)(2) Collect and recycle purge to a process.
	0	§63.166(b)(3) Capture and transport to control device.
	0	§63.166(b)(4)(i) Collect, store, transport to HON WMU
	3	§63.166(b)(4)(ii) Collect, store, transport to TSD facility
	0	§63.166(b)(4)(iii) Collect, store, transport to a non-haz. waste facility
	0	§63.166(c) <i>In-situ</i> sampling system or without purge
	TOTAL:	3
Open-ended valves or lines:	0	§63.167(d) Part of emergency shutdown system.
	0	§63.167(e) Contains polymerizing, explosive or hazardous materials.
	TOTAL:	NA Note: Open-ended valves are equipped with a cap, plug, blind flange, or 2 nd valve. These fittings are included in the connector/valve population and are monitored if required by other applicable regulation.

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

Introduction (continued)

Equipment Type	Number	Method of Compliance
Valves in gas/vapor or in light liquid service:	0	§63.168(a)(3) Annual leak detection and repair.
	0	§63.168(a)(3) Semi-annual leak detection and repair.
	0	§63.168(b) Quarterly leak detection and repair.
	0	§63.168(h) Unsafe-to-monitor.
	0	§63.168(i) Difficult-to-monitor.
	TOTAL:	NA
Pumps in heavy liquid service:	N/A	§§63.169(a) Observe for leak by sensory methods; Monitor and/or repair. The work practice is identify equipment in heavy liquid service by the use of facility's P&ID's.
Valves in heavy liquid service:		
Connectors in heavy liquid service:		
Agitators in heavy liquid service:		
Instrumentation systems:	0	§63.169(a) Observe for leak by sensory methods; Monitor and/or repair.
Pressure relief devices in liquid service:	0	§63.169(a) Observe for leak by sensory methods; Monitor and/or repair.
TOTAL:	NA	
Closed vent systems and control devices:	1	§63.172(f)(1) Annual visual inspection (hard-piped).
	0	§63.172(f)(2) Annual monitoring (duct work).
	0	§63.172(k) Unsafe-to-inspect.
	0	§63.172(l) Difficult-to-inspect
TOTAL:	1	
Agitators in gas/vapor service or in light liquid service:	0	§63.173(a) Monthly leak detection and repair.
	0	§63.173(d) Equipped with dual mechanical seal system.
	0	§63.173(e) No externally actuated shaft.
	0	§63.173(f) Equipped with closed vent system
	0	§63.173(g) Within boundary of an unmanned plant site.
	0	§63.173(h) Difficult-to-monitor.
	0	§63.173(i) Obstructed.
	0	§63.173(j) Unsafe-to-monitor.
TOTAL:	NA	

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

Introduction (continued)

Equipment Type	Number	Method of Compliance
Connectors in gas/vapor service or in light liquid service.	N/A	§63.174(b) Annual leak detection and repair.
	N/A	§63.174(b)(4) Biennial leak detection and repair.
	N/A	§63.174(b)(4) Quadrennial leak detection and repair.
	N/A	§63.174(c)(2) Screwed connectors ≤ 2" installed prior to 12/31/92.
	N/A	§63.174(f) Unsafe-to-monitor.
	N/A	§63.174(g) Unsafe-to-repair.
	N/A	§63.2480(b)(4) --> §63.169 for connectors in heavy liquid service.
TOTAL:	NA	Note: §63.2480(b)(4) of MON allows you to elect to comply with the requirements in §63.169 for connectors in heavy liquid service, including all associated recordkeeping and reporting requirements, rather than the requirements of §63.174.

B. Planned Schedule for Each Phase – Pumps and Valves

Not Applicable

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

C. Batch Process Pressure Testing Alternative §63.178(b)

Provide the batch products and batch product codes subject to the pressure testing alternative for batch processes and the planned schedule for pressure testing when the equipment is configured for production of products subject to MON. [§63.182(c)(2)]

Note: For MON purposes, the requirements for pressure testing in §63.178(b) may be applied to all processes, not just batch processes. [§63.2480(b)(1)]

Not Applicable – Not using the pressure testing alternative for batch processes.

Applicable – Will follow the pressure testing of batch product-process equipment to demonstrate compliance with Subpart H in lieu of complying with the monitoring provisions of §§63.163, 63.168 and §63.169, and 63.173 through 63.176 of Subpart H.

Batch (or Continuous) Product or Product Code	Planned Schedule for Pressure Testing
OMU2 Process	Annual

D. Alternative for Enclosed-Vented Process Units §63.179

For those process units complying with the alternative means of emission limitation for enclosed-vented process units, provide a description of the system to create negative pressure in the enclosure and the control device used to comply with the requirements of §63.172 of Subpart H. [§63.182(c)(3)]

Not Applicable – Not using the enclosed-vented process unit alternative in §63.179.

Applicable – Complying with the enclosed-vented process unit alternative in lieu of the requirements in §63.163 through 63.171 and 63.173, 63.174.

Description of system used to create negative pressure in the enclosure:	
Description of control device used to comply with the requirements of §63.172 of Subpart H.	

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

E. Control Devices for Equipment Leaks	<input checked="" type="checkbox"/> Not Applicable – No control devices handle equipment leaks from components subject to the provisions of Subpart H. <input type="checkbox"/> Applicable – Using closed-vent systems and control devices to comply with the provisions of Subpart H. See information below on applicable control devices and the parameters monitored to ensure that they are operated and maintained in conformance with their design.
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Applicable?	Description	Control Device ID	Parameter Monitored
<input type="checkbox"/>	Recovery or Recapture Device (e.g. condensers and absorbers) designed and operated to recover the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with: <ul style="list-style-type: none"> • an efficiency of 95 percent or greater, or • to an exit concentration of 20 parts per million by volume, whichever is less stringent. <p style="text-align: right;">[§63.172(b)]</p>		
<input type="checkbox"/>	Enclosed combustion devices designed and operated to reduce the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with: <ul style="list-style-type: none"> • an efficiency of 95 percent or greater, or • to an exit concentration of 20 parts per million by volume, on a dry basis, corrected to 3 percent oxygen, whichever is less stringent, or • to provide a minimum residence time of 0.50 seconds at a minimum temperature of 760 °C. <p style="text-align: right;">[§63.172(c)]</p>		
<input type="checkbox"/>	Flare in compliance with the requirements of §§63.11(b) of subpart A of this part. <p style="text-align: right;">[§63.172(d)]</p>		

F. Other Alternative Means of Emission Limitation (General) §63.177

Not Applicable – Not using any alternative means of emission limitation under §63.177.
 Applicable – Permission was granted to use an alternative means of emission limitation under §63.177 and §63.6(g) of Subpart A.

Affected Equipment	Description of Alternative:

Section IX. Process Wastewater

Introduction

This section provides the results of any process wastewater applicability determinations.

A. Summary of Applicable Process Wastewater Streams

Complete the following table listing all applicable process wastewater streams.

Note: For new sources, include Table 8 – HON Subpart G compounds in a separate column.

Not Applicable

[§63.146(b)(1), (b)(2), 63.152(b)(1), Table 15 of Subpart G, §63.2520(d)(2)(i)]

(1) Wastewater Stream ID	(2) Description of Each Point of Determination (POD)	(3) Existing or New Affected Source?	(4) Designated as a Group 1 Stream? (Yes/No)	(5) Partially Soluble HAPs (PSHAP)	(6) Partially Soluble HAP (PSHAP) Annual Average Concentration (ppmw)	(7) What is the total annual load of PSHAP? (lb/yr)

(1) Wastewater Stream ID, contd.	(8) Soluble HAP (SHAP)	(9) Soluble HAP (SHAP) Annual Average Concentration (ppmw)	(10) What is the total annual load of SHAP? (lb/yr)	(11) Total PSHAP and SHAP Concentration (ppmw)	(12) Annual average flow rate (liter per minute)	(13) What is the total annual load of PSHAP and SHAP? (TPY)	(14) Group 1 or Group 2 Process Wastewater Stream	(15) For Group 2 streams, method for Determining PSHAP / SHAP Concentration and (Attachment # for supporting documentation)

Continued on next page

Section IX. Process Wastewater, Continued

B. Summary of Exempt Process Wastewater Streams

Complete the following table listing all exempt process wastewater streams.

Not Applicable

[§63.2520(d)(2)(i)]

(1) Wastewater Stream ID	(2) Description of Point of Determination / Evaluation	(3) Exemption Reason

Continued on next page

Section IX. Process Wastewater, Continued

C. Waste Management Unit Information

For Group 1 Process Wastewater Streams Only:

Not Applicable

Are any Group 1 wastewater streams transferred for treatment to an off-site treatment or on-site treatment not owned or operated by the source (Dow)?

Yes No

If yes, provide:

Name of the receiving party:	
Location:	
Does treatment facility meet the "Treatment in RCRA Unit Option" under §63.138(h)?	<input type="checkbox"/> Yes, the wastewater will be treated as hazardous waste at a facility that meets the requirements of §63.138(h) as an alternative to the off-site facility submitting the certification specified in §63.132(g)(2). <input type="checkbox"/> No, the treatment facility is not meeting the requirements in §63.138(h).

Indicate with an asterisk which streams below are transferred to an off-site treatment or on-site treatment not owned or operated by the source.

[§63.146(b)(2), (b)(7)(ii)(A), 63.152(b)(1)-(b)(2), Tables 13 and 15 of Subpart G, §63.2520(d)(2)(iii)]

(1) Wastewater Stream ID	(2) Treatment Process ID	(3) Waste Mgt. Unit Identification	(4) Description of Waste Mgt. Unit	(5) Intended Control Device / Technique	(6) Monitored Parameters for Control Device	(7) Proper Operating Range for Control Device	(8) Rationale for Chosen Operating Range for Control Device, Attachment #

Continued on next page

Section IX. Process Wastewater, Continued

D. Treatment Process Information

For Group 1 Process Wastewater Streams Only:

Not Applicable

Note: The alternative requirements provided in §§63.2485(n) for wastewater that is Group 1 for soluble HAP only that is discharged to biological treatment is not currently used by this MCPU.

Are any Group 1 wastewater streams transferred for treatment to an off-site treatment or on-site treatment not owned or operated by the source (Dow)?

Yes No

If yes, provide:

Name of the receiving party:	
Location:	
Does treatment facility meet the "Treatment in RCRA Unit Option" under §63.138(h)?	<input type="checkbox"/> Yes, the wastewater will be treated as hazardous waste at a facility that meets the requirements of §63.138(h) as an alternative to the off-site facility submitting the certification specified in §63.132(g)(2). <input type="checkbox"/> No, the treatment facility is not meeting the requirements in §63.138(h).

Indicate with an asterisk which streams below are transferred to an off-site treatment or on-site treatment not owned or operated by the source.

[§63.146(b)(4), (b)(8), (b)(9), 63.152(b)(1)-(b)(2), (b)(5), Table 12 and 17 of Subpart G, §63.146(f), §63.2485(i)(1), (n), §63.2520(d)(2)(ii)-(iii), §63.7(g)]

(1) Wastewater Stream ID	(2) Description of Treatment Process	(3) Treatment Process ID	(4) Monitoring Parameters for the treatment process	(5) Designed Maximum or Minimum Level of Monitored Parameter	(6) Rationale for Level (Attachment #	(7) Results of Initial Measurements and Supporting Calculations (Attachment Number)	(8) Design Evaluation (DE) or Performance Test (PT) - Attachment # -

Continued on next page

Section IX. Process Wastewater, Continued

E. Information on Residuals

For Group 1 Process Wastewater Streams Only:

Not Applicable

Are any residuals removed from Group 1 wastewater streams transferred for treatment to an off-site treatment or on-site treatment not owned or operated by the source (Dow)?

Yes No

If yes, provide:

Name of the receiving party:	
Location:	
Does treatment facility meet the "Treatment in RCRA Unit Option" under §63.138(h)?	<input type="checkbox"/> Yes, the wastewater will be treated as hazardous waste at a facility that meets the requirements of §63.138(h) as an alternative to the off-site facility submitting the certification specified in §63.132(g)(2). <input type="checkbox"/> No, the treatment facility is not meeting the requirements in §63.138(h).

Indicate with an asterisk which streams below are transferred to an off-site treatment or on-site treatment not owned or operated by the source.

[§63.146(b)(6), 63.152(b)(5), Table 19 of Subpart G, 63.2485(i)(1)]

(1) Residual ID Number ^(a)	(2) Residual description ^(b)	(3) Wastewater stream ID ^(c)	(4) Treatment process from which residual originates	(5) Fate ^(d)	(6) If Fate = D, Treatment Process Identification Used to Destroy Residual by 99% (Mark N/A if Fate does not = D)	(7) If Fate = D - Treatment Process Efficiency Attachment # ^(f)	(8) Waste Management Unit ID(s)	(9) Intended Emission Control Technique

Continued on next page

Section IX. Process Wastewater, Continued

Notes:

- (a) Name or identification code of residual removed from Group 1 wastewater stream.
- (b) Description of residual (e.g., steam stripper A-13 overhead condensates).
- (c) Identification of stream from which residual is removed.
- (d) Fate - Indicate whether the residual is:
 - A. Recycled to a production process
 - B. Sold for the purpose of recycling.
 - C. Returned to the treatment process.
 - D. Treated to destroy the total combined mass flow rate of Table 9 compounds by 99 percent or more.
 - E. In compliance with the requirements for the RCRA treatment option.
- (e) If the fate of the residual is such that the HAP mass is destroyed by 99 percent, give description of device used for HAP destruction. The types of treatment processes that are acceptable include nonbiological, noncombustion treatment processes and combustion treatment processes.
- (f) If the fate of the residual is such that the HAP mass is destroyed by 99 percent, provide an estimate of control device efficiency and attach substantiation in accordance with the instructions for this section.

Continued on next page

Section IX. Process Wastewater, Continued

F. Initial Compliance Demonstration Not Applicable

– Control Devices Controlling Vent

Emissions from WMUs

[63.146(b)(7)(B)-(C), 63.152(b)(1), 63.139(d)(1) - (d)(2), 63.2520(d)(2)(ii), 63.7(g)]

Applicable? (Yes/No)	Waste Management Unit ID	Type of Control	Allowed Methodology to Demonstrate the Initial Compliance Verification	Attachment #(s) for Demonstration of Initial Compliance
		Group 1 Wastewater Streams - Vents from waste management units - Reduce the organic HAP emissions vented to the control device by 95 %wt or greater	Option 1 - Use performance test data.	See Attachment # _____ for the determination of compliance with the 95% reduction requirement.
			Option 2 - Prepare a design evaluation.	See Attachment # _____ for the design evaluation to show compliance with the 95% reduction requirement.
			The control device has been previously tested using the requirements specified in this rule.	No performance test is required. See Attachment # _____ for previous test report.
		Group 1 Wastewater Streams - Vents from waste management units - Achieve an outlet TOC concentration of 20 ppmv.	Demonstrate the 20 ppmv standard by doing a performance test.	See Attachment # _____ for the performance test for determining compliance with the 20 ppmv outlet TOC limit.
		Group 1 Wastewater Streams – Vents from waste management units – Reduce the vent emissions using a flare.	Comply with §63.11(b). Compliance determination should include visible emissions, net heating value and exit velocity. Include: <ul style="list-style-type: none"> the flare design (i.e. steam assisted, air assisted, or non-assisted) all visible emission readings, heat content determinations, flow rate measurements, and exit velocity determinations reports of times and durations of all periods during the compliance determination when the pilot flare is absent or the monitor is not operating 	See Attachment # _____ for the flare compliance demonstration.
		Group 1 Wastewater Streams - Wastewater Tanks receiving, managing, or treating an affected process wastewater stream or a residual from an affected process wastewater stream - Reduce emissions by using an internal floating roof tank.	Internal floating roof tank - do external visual inspection by compliance date.	See Attachment # _____ for results of external visual inspection.
		Group 1 Wastewater Streams - Wastewater Tanks receiving, managing, or treating an affected process wastewater stream or a residual from an affected process wastewater stream - Reduce emissions by using an external floating roof tank	External floating roof tank – do seal gap measurements by the compliance date.	See Attachment # _____ for seal gap measurements.

Continued on next page

Section IX. Process Wastewater, Continued

F. Initial Compliance Demonstration – Control Devices Controlling Vent Emissions from WMUs, continued

Not Applicable

Applicable? (Yes/No)	Waste Management Unit ID	Type of Control	Allowed Methodology to Demonstrate the Initial Compliance Verification	Attachment #(s) for Demonstration of Initial Compliance
		Halogenated vents streams – Use of a combustion device to comply with the wastewater vent stream provisions for a halogenated vent stream.	Demonstrate that the halogen reduction device reduces emissions by either of the amounts specified below: <ul style="list-style-type: none"> A halogen reduction device after the combustion control device must reduce overall emissions of hydrogen halides and halogens by 95 percent or to a concentration < 20 ppmv. A halogen reduction device located before the combustion control device must reduce the halogen atom content of the vent stream to a concentration < 20 ppmv. 	See Attachment # _____ for performance test to demonstrate compliance with the halogenated vent stream provisions.
		Boiler or process heater with a design heat input capacity of 44 MW or greater	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater into which the emission stream is introduced with the primary fuel	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater burning hazardous waste for which the owner or operator has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H.	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater burning hazardous waste for which the owner or operator has certified compliance with the interim status requirements of 40 CFR part 266, subpart H	Exempt from initial compliance demonstration.	Not applicable
		Hazardous waste incinerator for which the owner or operator has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, Subpart O.	Exempt from initial compliance demonstration.	Not applicable
		Hazardous waste incinerator for which the owner or operator has certified compliance with the interim status requirements of 40 CFR part 265, Subpart O	Exempt from initial compliance demonstration.	Not applicable

Continued on next page

Section IX. Process Wastewater, Continued

G. Fixed Roofs, Covers and Enclosures

For each fixed roof, cover, and enclosure on wastewater tanks, surface impoundments, containers, individual drain systems, and oil-water / organic-water separators, provide the initial monitoring results: (Check one)

[63.2525(d)(2)(ii), 63.148(b)(3), 63.152(b)(1)]

<input checked="" type="checkbox"/> Not Applicable	No process wastewater streams or only Group 2 process wastewater streams.
<input type="checkbox"/> Not Applicable	No fixed roofs, covers or enclosures on wastewater tanks, surface impoundments, containers, individual drain systems, and oil-water separators
<input type="checkbox"/> Not Applicable	All fixed roofs and enclosures are operated under negative pressure.
<input type="checkbox"/> Applicable	No leaks detected during initial inspection – date of inspection: {Enter Date}
<input type="checkbox"/> Applicable	Leak detected during initial inspection – date of inspection: {Enter Date}. Required information is provided below.

Complete the following table ONLY if leaks were detected during monitoring / inspection:

(1) Waste Management Unit I.D.	(2) Fixed Roof, Cover or Enclosure Inspection?	(3) Date Visual Leak Detected	(4) Date of First Attempt at Repair	(5) Date Leak Was Repaired OR "Delay of Repair" if Necessary

Complete the following table for components on Delay of Repair:

(6) Reason for Delay of Repair Code	(7) Name of Person who Made Delay of Repair Decision	(8) Expected Date of Repair (if not Already Repaired)	(9) Date(s) of shutdowns that occurred while the component was unrepaired	(10) Date of Successful Repair of the Leak

Reason for Delay of Repair Codes:

- A. Repair is technically infeasible without a shutdown or
- B. Emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair.

Section X. Maintenance Wastewater

Introduction

This section provides the results of any maintenance wastewater applicability determinations.

A. Summary of Applicable Maintenance Wastewater Streams

Check appropriate box for each MCPU.

- Maintenance wastewater plan applies and is implemented per 63.2485(b), 63.105
 Not applicable for this MCPU; no maintenance wastewater streams.

B. Summary of Exempt Maintenance Wastewater Streams

Complete the following table listing all exempt maintenance wastewater streams.

- Not Applicable

(1) Wastewater Stream ID or Activity	(2) Exemption Reason

Section XI. Liquid Streams in Open Systems

Introduction

This section provides the results of any storage tank applicability determinations.

A. Summary of Equipment Handling Liquid Streams in Open Systems

Complete the following table listing all equipment subject to the provisions in §§63.2485(l) for liquids streams in open systems.

Note: For new sources, include Table 8 – HON Subpart G compounds in a separate column.

Not Applicable

(1) Equipment ID	(2) Equipment Type	(3) Partially Soluble HAPs (PSHAP)	(4) Partially Soluble HAP (PSHAP) Annual Average Concentration (ppmw)	(5) What is the total annual load of PSHAP? (lb/yr)	(6) Soluble HAP (SHAP)	(7) Soluble HAP (SHAP) Annual Average Concentration (ppmw)	(8) What is the total annual load of SHAP? (lb/yr)	(9) Total PSHAP and SHAP Concentration (ppmw)

Continuation of table above:

(1) Equipment ID, contd.	(10) Annual average flow rate (liter per minute)	(11) What is the total annual load of PSHAP and SHAP? (TPY)	(12) Control Required?	(13) Control Method Code	(14) Control Device ID	(15) If using a control device, which standard does the control device meet?

Continued on next page

Section XI. Liquid Streams in Open Systems, Continued

**B. Summary of
Equipment Exempt
from the
Requirements for
Liquid Stream in
Open Systems**

Complete the following table listing all equipment exempt from the provisions for liquid streams in open systems.

Not Applicable

(1) Equipment ID	(2) Exemption Reason

Section XII. Heat Exchange Systems

Introduction

This section provides the results of any heat exchange system applicability determinations.

A. Summary of Applicable Heat Exchange Systems

Complete the following table listing all heat exchange systems subject to monitoring.

Not Applicable

(1) Heat Exchange System ID	(2) Heat Exchanger Type	(3) Monitoring Option Selected	(4) What will be monitored?

For batch operations, include the following

- Note: XXXX MCPU is a process that is not operational throughout the year. Therefore, the heat exchange system will be monitored monthly during periods of operation during the initial six month period from May 2008 -October 2008. As allowed by § 63.2490 and § 63.104 (b)(1), and (c)(1)(iii) after initial six months, monitoring will be conducted quarterly if the process is operational for any period during that quarter. During calendar months or quarters of non-operation, no monitoring will be conducted.

B. Summary of Exempt Heat Exchange Systems

Complete the following table listing all exempt heat exchange systems.

Not Applicable

(1) Heat Exchange System ID	(2) Which exemption is being used?	(3) List any supporting details for exemption documentation
E-400 (K05 Reactor Condenser)	An Intervening cooling fluid containing less than 5% by weight of total HAP is used	A Mixture of propylene glycol and water is used as the cooling fluid. Propylene glycol is not a HAP (1-2010 revision)
E-325 (K06 Separation Recovery Cooler)	Same as above	Same as above

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process

A. General Information

The purpose of this section is to include all information required to be reported by Subpart SS (§63.999(b)) for closed vent systems, control device, and routing emissions to a fuel as system or a process.

Not Applicable –Subpart SS is not applicable to this MCPU because either no emission points subject to control and/or no emission points are routed to a control device, a fuel gas system, recovery device, or a process.

Applicable – Complete all of Section XIII that is applicable if you are the operator of the control device or recovery devices (including recovery devices used to maintain the TRE index value within specified limits) .

A.1. Definition of Operating Day

The source's operating day for purposes of determining daily average values of monitored parameters is defined as follows: (Note: The operating day may be from midnight to midnight or another daily period).

Not Applicable – This section is not applicable because records of daily averages are not required.

[§63.998(b)(3)(i)(B), §63.999(b)(3)(iii)]

Operating Day Begin Time:	12:00 am
Operating Day End Time:	12:00 pm

A.2. Alternative Recordkeeping

The alternative recordkeeping requirements of §§63.998(b)(5) are being implemented.

Applicable – Only the daily average value will be retained and not the more frequently monitored operating parameter values for a monitored parameter. The requirements specified in §63.998(b)(5)(i)(A) through (F) are met.

Not Applicable

[§63.998(b)(5), 999(b)(5)]

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

B. Routing Emissions to a Process or Fuel Gas System

This section applies if electing to comply with the requirements for storage vessels, low throughput transfer racks, or equipment leaks by routing emissions to a process or to a fuel gas system.

B.1. Storage Tank and Transfer Rack Emissions Routed to a Process

- Not Applicable** – Emission streams from storage vessels or transfer racks are not routed to a process.
- Applicable** - Storage vessel and/or transfer rack emissions are routed to a process. For storage vessels only, see the attachment number(s) below for the design evaluation or engineering assessment demonstrating the extent to which regulated material emissions are:
- Recycled and/or consumed in the same manner as a material that fulfills the same function in that process;
 - Transformed by chemical reaction into materials that are not regulated materials;
 - Incorporated into a product; and/or
 - Recovered.

[§63.999(b)(1)(i), (iii) → §63.984(b)(2), (b)(3)]

ID of Storage Tank or Transfer Rack Routed to a Process	For Storage Tanks, which Condition is Met ^a	Attachment # for Design Evaluation or Engineering Assessment

- (a) Codes for Routing Emissions to a process - Regulated material in the emissions are:
- (1) Recycled and/or consumed in the same manner as a material that fulfills the same function in that process;
 - (2) Transformed by chemical reaction into materials that are not regulated materials;
 - (3) Incorporated into a product; and/or
 - (4) Recovered.

B.2. Storage vessel and Transfer Rack Emissions are routed to a fuel gas system

- Not Applicable** - Emission streams from storage vessels or transfer racks are not routed to a fuel gas system.
- Applicable** – Emission streams from the following storage tanks and transfer racks are connected to a fuel gas system. The conveyance system(s) is/are subject to the closed vent system requirements in §§63.983.
- {Storage Tank / Transfer Rack ID}
 - {Storage Tank / Transfer Rack ID}
 - {Storage Tank / Transfer Rack ID}

[§63.999(b)(1)(ii) → §63.984(c)]

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

C. Routing Emissions from Storage Tank and Low Throughput Transfer Racks to a NonFlare Control Device and / or Halogen Reduction Device

This section applies if routing storage vessel or low throughput transfer rack emissions to a nonflare control device and/or halogen reduction device.

Not Applicable

[§63.985(a), (b), (c), §63.999(b)(2)(i)-(vi), §63.2520(d)(2)(ii)-(iii), 63.7(g)]

(1) Storage Tank or Low Throughput Transfer Rack ID	(2) Emission Point Type - Storage Tank (ST) or Transfer Rack (TR-L)	(3) Control Device or Halogen Reduction Device ID	(4) Type of Control Device or Halogen Reduction Device	(5) Parameter(s) To Be Monitored for Control Device	(6) Monitoring Plan (Attachment #) – including monitoring frequency ^(a)	(7) Monitoring Parameter Operating Limit	(8) Design Evaluation (DE) or Performance Test (PT) – (Attachment #) ^(b)	(9) If performance test is conducted – Attachment # for Continuous Monitoring Data Measured During Performance Test

(a) For storage tanks, the monitoring plan requirements do not apply for the purposes of MON. You must establish operating limits, conduct monitoring and keep records using the same procedures as required in Subpart SS for control devices used to control emissions from process vents.

(b) If a performance test is conducted, include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

D. Routing Emissions from Process Vent and Transfer Racks (Excluding Low Throughput) to a Nonflare Control Device and/or Halogen Reduction Device

This section applies if routing process vent or transfer rack (excluding low throughput transfer racks) emissions to a nonflare control device and/or halogen reduction device.

Not Applicable

[§63.988(b), §63.990(b), §63.994(b), §63.995(b), §63.996(c)(6), §63.999(a)(2)(iii)(B) → §63.998(a)(2)(ii), §63.999(b)(3)(i)-(ii), §63.999(b)(4) → §63.998(a)(4), §63.2520(d)(2)(ii)-(iii), 63.7(g)]

(1) Process Vent or Transfer Rack ID	(2) Emission Point Type Process Vent (PV) or Transfer Rack (TR-H)	(3) Control Device or Halogen Reduction Device ID	(4) Type of Control Device or Halogen Reduction Device	(5) Parameter(s) To Be Monitored for Control Device	(6) Monitoring Parameter Operating Limit	(7) Rationale for the Parameter Limit (Attachment #) ^(a)	(8) Halogen concentration in vent stream ^(b)	(9) Design Evaluation (DE) for Small Control Devices or Performance Test (PT) for Large Control Devices – (Attachment #) ^(c)	(10) Continuous Monitoring Data Measured During Performance Test (Attachment #)

^(a) Attach the rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control device.

^(b) Halogen concentration is not required if the vent stream is designated as halogenated. Indicate that the stream is designated as halogenated, if applicable.

^(c) Include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §§63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process, Continued

E. Routing Emissions to a Flare

This section applies if routing emissions to a flare.

Not Applicable

[§63.987(b), §63.999(a)(1)(ii), (a)(2), (a)(2)(iii)(A) → §63.998(a)(1)(i), §63.2520(d)(2)(ii), 63.7(g)]

(1) Emission Source ID	(2) Emission Source Type -Storage Tank (SV), Transfer Rack (TR), Process Vent (PV) ^(d)	(3) Flare ID	(4) Flare design ^(a)	(5) Flare Compliance Assessment Report (Attachment #) ^{(b), (c)}

^(a) Flare design – i.e. steam-assisted, air-assisted, or non-assisted.

^(b) Include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §§63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

^(c) For flare compliance assessments, include all visible emission readings, heat content determinations, flow rate measurements, and exit velocity determinations. Also include all periods during the flare compliance assessment when all pilot flames are absent or, if only the flare flame is monitored, all periods when the flare flame is absent.

^(d) Refer to Section VIII.E. (HON Subpart H) or Section VIII.D. (Subpart UU) for equipment leak components routed to a closed vent system and flare.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process, Continued

F. Recovery Devices for Maintaining TRE above a Specified Level

This section applies to process vent emissions that are routed to a final recovery device to maintain a TRE above a level specified in a referencing subpart.

Not Applicable

[§63.993(b), §63.999(a)(2)(iii)(C) → §63.998(a)(3), §63.999(b)(3)(i)-(ii)]

(1) Process Vent ID	(2) Recovery Device ID	(3) Type of Recovery Device ^(a)	(4) Parameter(s) To Be Monitored for Recovery Device	(5) Monitoring Parameter Operating Limit	(6) Rationale for the Parameter Limit(Attachment #) ^(b)	(7) TRE Index Value Determination (Attachment #)	(8) Continuous Monitoring Data Measured During TRE Determination (Attachment #)
K06	E-325	Condenser	Condenser Vent Exit Gas Temperature	5°C (Daily Average)	OMU2 MON E325 Rational Attachment #: OMU2-01-1	OMU2 E325 Normal Op TRE OMU2 E325 Standby TRE Attachment #OMU2-01-1	Attachment #OMU2-01-1

^(a) See Method of Control Codes in Appendix A

^(b) Attach the rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control device.

Section XIV. Continuous Emissions Monitoring Systems (CEMS)

A. CEMS Performance Evaluation

Each continuous emissions monitoring system (CEMS) must be installed, operated, and maintained according to the requirements in §63.8 and §63.2450(j)(1)-(j)(5).

- Not Applicable**
 Applicable

If applicable, list the Attachment number for the results of the performance evaluations of each CEMS conducted according to the requirements in §63.8 and according to the applicable Performance Specification of 40 CFR Part 60, appendix B.

Attachment # for CEMS Performance Evaluation:	
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[§§63.2450(j)(3), §63.8]

B. Alternative Standard

To demonstrate compliance with the alternative standard for continuous process vents, batch process vents, hydrogen halides / halogen HAPs, or storage tanks, submit the results of any determination of target analytes of predominant HAP.

- Not Applicable**
 Applicable – Complying with alternative standard (§§63.2505). Results of determination of target analytes are included below:

[§63.2505(b)(5)]

Attachment #: OMU2-01-1

Rationale for Monitoring Parameter Operating Limit and TRE Index Value Determination

40 CFR 63 Subpart FFFF

**National Emission Standards for Hazardous Air Pollutants: Miscellaneous Organic
Chemical Manufacturing (MON)**

Supporting Rationale for Monitored Parameter Operating Limit

Condenser E-325 is used to cool and condense toluene from the process vent gas Product Separation and Recovery System (K06). Process operating conditions for Condenser E-325 are based on engineering calculations and were confirmed through testing. Flow rates were determined from good engineering practices. The amount of toluene in the vent gas stream was calculated using standard engineering methods and assuming that the condenser vent gas will be saturated with toluene.

TRE Index Value Determination

See attached.

**Attachment #OMU2-01
Normal Operating Scenario**

**Description of the
Process / Type of
Equipment Used**

Process ingredients are received in containers. Solvent #1 is fed to either Tank K04 or Tank K20 (Group 2 Batch Process Vents). Solvent #3 is fed to Solvent Tank K18 (Group 2 Batch Process Vent).

Solvent 1 is transferred to the Reactor K05 where other process ingredients are added. K05 vent is either routed to the flare or vents to air. (Group 2 Batch Process Vent)

The reactor mixture is transferred to the Hold Tank K06 (Exempt Surge Control Vessel).

The Hold Tank feeds a continuous Product Separations and Recovery System K08. Solvent #3 is added to K08 as a processing aid from process vessel K18. The vent from K08 is a recovery device that condenses solvent that is returned to the process. Condenser Vent E-325 is a Group 2 Continuous Process Vent.

Except as noted above for Reactor K05 Group 2 process vents are routed to a flare to comply with WV Division of Air Quality Permit R13-2631.

Products and waste materials are discharged to containers (KXX) for shipping and management.

**Identification of
Each Process Vent
and its associated
Emissions
Episodes and
Durations**

See MON Notification of Compliance Status, Section IV.A. for a summary of applicable batch process vents.

**Identification of
wastewater Point
of Determinations
(PODs)**

As reported in the MON Notification of Compliance Status, Section IX.A there are no process wastewater streams for this MCPU.

**Identification of
storage tanks**

As reported in the MON Notification of Compliance Status, Section VI.A. there are no storage tanks and applicable surge control vessels / bottoms receivers that meet the capacity and vapor pressure thresholds for a Group 1 storage tank.

**Identification of
transfer racks**

As reported in the MON Notification of Compliance Status, Section VII.A. there are no transfer racks for this MCPU subject to control.

**Applicable Control
Requirements /
Level of Required
Control**

Not applicable.

Control or treatment devices used

Not Applicable

Control Device ID	Control Device Type

For Group 1 process wastewater streams only:

Not Applicable

Treatment Device ID	Treatment Device Type

Description of operating and/or testing conditions for any associated control device

Not applicable

Process vents, wastewater PODs, transfer racks and storage tanks (including those from other processes) Simultaneously routed to the Control or Treatment Device(s)

Not applicable

Applicable monitoring requirements / Parametric Levels

Continuous temperature monitor of continuous process vent gas from K08 - Condenser E-325

Calculations and engineering analyses required to demonstrate compliance

OMU2-02 Process Operating Scenario – Standby Operation

Description of the Process / Type of Equipment Used

The OMU2 Process may periodically temporarily suspend and be placed in stand-by operational status. During standby periods, process transfers are discontinued. Nitrogen blanketing and/or small nitrogen purges are maintained on some pieces of equipment for safety.

The equipment covered by this operating scenario is the same as that provided as the Normal Operating Scenario OMU-01.

Uncontrolled HAP emissions for standby operating scenario from batch process vents will be equal to or less than amounts used to initially determine the applicability status of process vents.

Process vents during standby operations will be either exempt or Group 2. The Product Separation/Solvent Recovery System (Equipment ID K06) will be a Group 2 continuous process vent because the Total Resource Effective (TRE) for standby operations is calculated to be greater than 5.0. The TRE was determined assuming HAP saturated vent gas flow at ambient temperature without coolant on the System Condenser (E-325). For Group 2 continuous process vents with TRE greater than 5.0, there are no additional monitoring or recordkeeping requirements. TRE calculation attached.

Identification of Each Process Vent and its associated Emissions Episodes and Durations

Condenser E-325 vent will be routed to flare during standby operating scenario. Flare is not needed to comply with MON requirements.

Identification of wastewater Point of Determinations (PODs)

Wastewater is not generated during this operating scenario.

Identification of storage tanks

Not applicable.

Identification of transfer racks

Not Applicable

Applicable Control Requirements / Level of Required Control

Not Applicable – All vents are Group 2 or exempt.

Control or treatment devices used

<input checked="" type="checkbox"/> Not Applicable	
Control Device ID	Control Device Type

For Group 1 process wastewater streams only:

Not Applicable

Treatment Device ID	Treatment Device Type

Description of operating and/or testing conditions for any associated control device

Not Applicable

Process vents, wastewater PODs, transfer racks and storage tanks (including those from other processes) Simultaneously routed to the Control or Treatment Device(s)

Not applicable

Applicable monitoring requirements / Parametric Levels

Not applicable

Calculations and engineering analyses required to demonstrate compliance

**Attachment #OMU2-03
 Process Operating Scenario –Wash Operations**

Description of the Process / Type of Equipment Used

On occasion, equipment will be emptied and cleaned for maintenance or other purposes. Typically, Solvent #1 is used for cleaning. However, Solvent #4 which is a volatile organic compound but is not a hazardous air pollutant, may be used from time to time for its ability to neutralize some process ingredients. Emissions during equipment wash activities will be routed to the flare (L15), ~~vented to air from the vacuum source (J36, Emission Point Identification Number AR9) or vented to the air from the vacuum pump condensate receiver (J41, Emission Point Identification Number AR1).~~

The equipment covered by this operating scenario is the same as that provided as Attachment #OMU-02, Normal Operating Scenario.

For determination of MON applicability, uncontrolled HAP emissions were included in batch vent total and for the continuous process vent.

Identification of Each Process Vent and its associated Emissions Episodes and Durations

See MON Notification of Compliance Status, Section IV.A. for a summary of applicable batch process vents.

Identification of wastewater Point of Determinations (PODs)

As reported in the MON Notification of Compliance Status, Section IX.A there are no process wastewater streams for this MCPU.

Identification of storage tanks

As reported in the MON Notification of Compliance Status, Section VI.A. there are no storage tanks and applicable surge control vessels / bottoms receivers that meet the capacity and vapor pressure thresholds for a Group 1 storage tank.

Identification of transfer racks

As reported in the MON Notification of Compliance Status, Section VII.A. there are no transfer racks for this MCPU.

Applicable Control Requirements / Level of Required Control

Not Applicable – All vents are Group 2 or exempt.

Control or treatment devices used

Not Applicable

Control Device ID	Control Device Type

For Group 1 process wastewater streams only:

Not Applicable

Treatment Device ID	Treatment Device Type

Description of operating and/or testing conditions for any associated control device

Not Applicable

Process vents, wastewater PODs, transfer racks and storage tanks (including those from other processes) Simultaneously routed to the Control or Treatment Device(s)

Not applicable

Applicable monitoring requirements / Parametric Levels

Continuous temperature monitor of continuous process vent gas – Condenser E-325

Calculations and engineering analyses required to demonstrate compliance

TRE-INDEX CALCULATION - EXISTING SOURCE

OMU2 Process
 ATTACHMENT OMU2-01-12

Plant : UCC Technology Park - Market Development Plant
 Unit : Organo Metallic Production Unit 2 (OMU2)
 Vent : E-325 Condenser (Product Separation and Solvent Recovery)
 Date : 4/13/2009
 Data basis: Weekend, standby operation - no coolant on condenser

Please note : If stream exits from final jet ejector without an after condenser, then the value of moles/hr water in cell F19 should be changed to : 0.000
 For all other cases, then moles/hr water in cell F19=C19/D1E

<<< Input data >>>

Component	Component Class	Vent Rate (lb/hr)	Molecular Weight	Net Heat of Combustion (Kcal/gmole)	lb mole/hr	Mole Fraction	Wet Conc. (ppmv)	Dry Conc. (ppmv)	All TOC's Heat Comb x Wet Conc	All TOC's Dry Conc. x MW	HAP only HAP Conc. x MW
Water	Water		18	0	0	0.0000	0.0	0.0			
Nitrogen	Non-TOC	7.50	28.0129	0	0.268	0.9963	996255.1	996255.1			
Toluene	TOC	0.093	92.14	902	0.001	0.0037	3744.9	3744.9	3376050.8	345057.5	345057.5
Summation=		7.593			0.2687	1.0000	1000000	1000000	3376051.	345057.	345057.

Total Flow= 0.0489 cu m/min
 Dry Flow(Q)= 0.0489 cu m/min

TRE Eq. Factors = HT 0.5874 ETOC 0.0421 EHAP 0.0421

>>>> Results <<<<

TRE	Control device basis	Type of stream
46.33	Flare	If nonhalogenated stream, use lowest of three TRE values
35.99	Thermal incinerator 0% heat recovery	"
60.14	Thermal incinerator 70% heat recovery	"
95.03	Thermal incinerator and scrubber	If halogenated stream, use this TRE value

Summary: TRE=<1.9 is Group 1 process vent, needs MACT control, monitoring
 5>=TRE>1.9 is Group 2 process vent requiring monitoring of recovery device, but no additional control
 TRE>5.0 is Group 2 process vent, no additional control or monitoring
 All TRE values require documentation and reporting

Definitions: TRE= Total Resource Effectiveness index value is a measure of supplemental total resource requirement per unit reduction of organic HAP
 HT= net heating value of the sample Use absolute value of HT.
 ETOC= hourly emission rate of TOC (minus methane & ethane)
 EHAP= hourly emission rate of total organic HAP
 Q= vent stream flow rate (dry) at 20C
 a,b,c,d = revised coefficients in Table 1
 Use lb/hr for most stringent normal operating conditions (i.e. those that result in lowest TRE index value)

Equation: $TRE = (1/EHAP) * (a + b * Q + c * HT + d * ETOC)$ 40CFR63.115(d)

4/15/2009

UT South Charleston Catalyst Plant
OMU 2 Process

ATTACHMENT OMU2 01-16

~~Union Carbide Corporation - Technology Park -
Market Development Plant - OMU2 Process~~

TRE-INDEX CALCULATION - EXISTING SOURCE

Plant : UCC Technology Park - Market Development Plant
Unit : Organo Metallic Production Unit 2 (OMU2)
Vent : E-325 Condenser
Date : 2/13/2009
Data basis: Engineering calculations by W. S. Hamilton *Normal Operation*

Please note : If stream exits from final jet ejector without an after condenser, then the value of moles/hr water in cell F19 should be changed to : 0.000
For all other cases, then moles/hr water in cell F19=C19/D1E

<<< Input data >>>

Component	Component Class	Vent Rate (lb/hr)	Molecular Weight	Net Heat of Combustion (Kcal/gmole)	lb mole/hr	Mole Fraction	Wet Conc. (ppmv)	Dry Conc. (ppmv)	All TOC's	All TOC's	HAP only
									Heat Comb x Wet Conc	Dry Conc. x MW	HAP Conc. x MW
Water	Water		18	0	0	0.0000	0.0	0.0			
Nitrogen	Non-TOC	44.10	28.0129	0	1.574	0.9880	988008.9	988008.9			
Toluene	TOC	1.76	92.14	902	0.019	0.0120	11991.1	11991.1	10809951.0	1104857.3	1104857.3
Summation=		45.860			1.5934	1.0000	1000000	1000000	10809951.	1104857.	1104857.

Total Flow= 0.2897 cu m/min
Dry Flow(Q)= 0.2897 cu m/min

TRE Eq. Factors = HT 1.8809 ETOC 0.7984 EHAP 0.7984

>>> Results <<<<

TRE	Control device basis	Type of stream
2.54	Flare	If nonhalogenated stream, use lowest of three TRE values
1.97	Thermal incinerator 0% heat recovery	"
3.24	Thermal incinerator 70% heat recovery	"
5.02	Thermal incinerator and scrubber	If halogenated stream, use this TRE value

Summary: TRE=<1.9 is Group 1 process vent, needs MACT control, monitoring
5>=TRE>1.9 is Group 2 process vent requiring monitoring of recovery device, but no additional control
TRE>5.0 is Group 2 process vent, no additional control or monitoring
All TRE values require documentation and reporting

Definitions: TRE= Total Resource Effectiveness index value is a measure of supplemental total resource requirement per unit reduction of organic HAF
HT= net heating value of the sample Use absolute value of HT.
ETOC= hourly emission rate of TOC (minus methane & ethane)
EHAP= hourly emission rate of total organic HAP
Q= vent stream flow rate (dry) at 20C
a,b,c,d = revised coefficients in Table 1
Use lb/hr for most stringent normal operating conditions (i.e. those that result in lowest TRE index value)

Equation: $TRE = (1/EHAP)^*(a+b*Q+c*HT+d*ETOC)$ 40CFR63.115(d)



**CERTIFIED MAIL
RETURN RECEIPT REQUESTED
7099 3400 0005 6079 3220**

Union Carbide Corporation
A Subsidiary of The Dow Chemical Company
PO Box 8361
3200/3300 Kanawha Turnpike
South Charleston, WV 25303
U.S.A.

June 21, 2010

Mr. Richard Fenton,
Performance Test Coordinator
WV Department of Environmental Protection
Division of Air Quality
601 57th Street SE
Charleston, WV 25304

Dear Mr. Fenton,

RE: Union Carbide Corporation South Charleston Technology Park
Title V Operating Permit R30-03900004-2006 (Group 2)
Market Development Plant – OMU2 Process
MON MACT
Condenser Performance Evaluation Test Report

Attached is the test report that demonstrates that the Total Resource Effectiveness Index (TRE) is greater than 1.9 but less than 5.0 for the continuous process vent from the OMU2 Process Product Separation/Solvent Recovery System Condenser (Equipment Identification Number E-325). As reported in the Notification of Compliance Status Report, and confirmed by this evaluation, the continuous process vent is a Group 2 vent pursuant to 40 CFR 63, Subpart FFFF, NESHAPs for Miscellaneous Organic Chemical Manufacturing Units.

I certify that, based on information and belief formed after reasonable inquiry, the statement and information in the report are true, accurate and complete.

If there are any questions regarding the report, please call Freddie Sizemore at (304) 747-3713.

Sincerely yours,

T. J. London
WVO Responsible Care Leader

cc: Mr. Bernard E. Turlinski, Associate Director
Office of Enforcement and Permit Review (3AP12)
U. S. Environmental Protection Agency
Region III
1650 Arch Street
Philadelphia, PA 19103-2029

Attachment

3.0 SUMMARY AND DISCUSSION OF TEST RESULTS

3.1 Objectives and Test Matrix

The purpose of this test is to demonstrate that the separation/solvent recovery system complies with the requirements of 40 CFR 63, Subpart FFFF (MON). The specific objectives were:

- Verify the engineering methods Group 2 classification using performance test methods (verify TRE value).
- Monitor process variables operating under conditions that are expected to result in the lowest TRE.
 - Exhaust Gas Vent Temperature
 - Vent Gas Flow Rate

3.2 Facility Operation

The purpose of this test was to demonstrate compliance of the separation/solvent recovery system with 40 CFR 63, Subpart FFFF (MON) during worst-case operation.

3.3 Results

This compliance test for the separation/solvent recovery system consisted of three runs. The separation/solvent recovery system was within the expected limits for all parameters. A summary of the parameters and results can found in the following tables of this report.

3.4 Comments/Exceptions

- Mr. Richard Fenton of the WVDEQ was present to observe testing.

TABLE 3.1: Separation/Solvent Recovery System Sampling Data

Parameter	RUN 1	RUN 2	RUN 3	AVERAGE	ALLOWABLE
Sample Date	4/13/2010	4/13/2010	4/13/2010	N/A	N/A
Sample Times	1138/1238	1315/1415	1440/1540	N/A	N/A
Stack Gas Velocity (ft/sec)	2.6	2.6	2.7	2.6	N/A
Stack Gas Wet Flow (cu ft/hr)	200	202	212	205	N/A
Gas Wet Flow Std Cond (scfh)	210	208	217	212	N/A
Catch Wt. Toluene (ug)	904292	813309	1608942	1108848	N/A
Conc. Toluene (ppmv)	26233	23593	46674	32167	N/A
Toluene Net Heating Val. (kcal/gmol)	892.71	892.71	892.71	892.71	N/A
Heat Value (Mj/scm)	4.07	3.66	7.25	5.0	N/A
Total Vent Flow (m3/min)	0.10	0.10	0.10	0.10	N/A
ETOC (kg/hr)	0.6	0.5	1.1	0.7	N/A
EHAP (kg/hr)	0.6	0.5	1.1	0.7	N/A
TRE	3.2	3.2	1.8	2.9	> 1.9

TABLE 3.2: Separation/Solvent Recovery System Process Data

Parameter	RUN 1	RUN 2	RUN 3	AVERAGE
Sample Date	4/13/2010	4/13/2010	4/13/2010	N/A
Sample Times	1138/1238	1315/1415	1440/1540	N/A
Flow Rate (Lb/hr)	3152	3130	3132	3138
Condenser Temperature (Deg C)	-4.84	-4.97	-4.85	-4.89

Univation Technologies South Charleston Catalyst Plant

~~JICC Technology Park Market Development Plant~~
Process Condenser Demonstration
OMU2 Process – Reactor (K05)

Attachment #: ~~MDP-OMU2-03~~ *OMU2-01-2*

**Rationale Why Condenser is a Process Condenser and
Initial Demonstration of Proper Operation**

40 CFR 63 Subpart FFFF

**National Emission Standards for Hazardous Air Pollutants: Miscellaneous Organic
Chemical Manufacturing (MON)**

Supporting Rationale as to Why Condenser is a Process Condenser

To produce the product, reactor contents must be blanketed with nitrogen. During some of the reaction steps and for system cleanups, the reactor vent gas is routed to a condenser (Equipment Identification Number E400) for recovery and return of process ingredients to the reactor. Condenser E400 is integral to the reaction process.

Initial Demonstration of Proper Operation

Date: 2/25/2010

Batch #: YB2555T8F1

MCPU	Operating Scenario Code	Process Condenser	Vessel ID	Lowest Boiling Point or Bubble Point of Substance in the Vessel	Instrument Tag for Vent Gas Temperature	Time	Vent Gas Temperature °C	Att. # for Material Balance, if applicable
OMU2	MDP-OMU2-01	E-400	K05	Toluene	14C-359-48	7:45	Begin	nap
						8:00	15.3	
						8:15	6.5	
						8:30	2.7	
						8:45	1.5	
						9:00	3.3	
						9:15	4.5	
						9:30	2.4	
						9:45	3.6	
						10:00	2.7	
						10:15	2.2	
						10:30	3.0	
						10:45	5.2	
						11:00	4.7	
						11:15	4.5	
						11:30	4.9	
						11:45	4.5	
						12:00	5.2	
						12:15	5.4	
						12:30	5.6	
						12:45	6.4	
						13:00	8.8	
						13:15	8.9	
						13:30	9.5	
						13:45	10.5	
						14:00	11.6	
						14:15	1.1	
						14:30	5.5	
						14:45	5.1	
						15:00	6.8	
						15:15	7.0	
						15:30	7.4	

Initial Demonstration of Proper Operation (continued)

MCPU	Operating Scenario Code	Process Condenser	Vessel ID	Lowest Boiling Point or Bubble Point of Substance in the Vessel	Instrument Tag for Vent Gas Temperature	Time	Vent Gas Temperature °C	Att. # for Material Balance, if applicable
						15:45	9.4	
						16:00	9.9	
						16:15	10.0	
						16:30	11.9	
						16:45	13.3	
						17:00	13.6	
						17:15	13.8	
						17:30	End	

Notification of Compliance Status (NOCS) Report

40 CFR 63 Subpart FFFF: National Emission Standards for Hazardous Air Pollutants: Miscellaneous Organic Chemical Manufacturing

**May 4, 2016
(Update to August 30, 2013 Submittal)**

Section I. General Information	5
A. General Information	5
B. Operating Scenarios	6
C. Recordkeeping Exemption	6
D. Changes to the Application for Approval of Construction or Reconstruction	7
Section II: Regulatory Overlap	8
A. Batch Process Vents Part of HON CMPU	8
B. Regulatory Overlap with 40 CFR parts 264 and 265, subparts AA, BB, and/or CC (Control Devices)	9
C. Regulatory Overlap with 40 CFR Part 264 / 265 Subpart BB (Equipment Leaks)	9
D. Compliance with 40 CFR Part 60, Subpart Kb or 40 CFR Part 61, Subpart Y (Storage Tanks)	10
E. Compliance with Subpart I, GGG, or MMM (Equipment Leaks)	11
F. Compliance with Subpart GGG (Pharma MACT) for Wastewater	12
G. Compliance with Subpart MMM (Pesticides MACT) for Wastewater	12
H. Compliance with other regulations for wastewater	13
I. Compliance with 40 CFR 60, Subparts DDD, III, NNN, or RRR (Process Vents)	14
J. Compliance with 40 CFR 61, Subpart BB (Transfer racks)	15
K. Compliance with 40 CFR 61, Subpart FF (Wastewater)	16
L. Compliance with 40 CFR 60, Subpart VV and 40 CFR 61, Subpart V (Equipment Leaks)	17
M. Applicability of Process Units Included in a Process Unit Group	18
N. Hierarchy Approach	20
Section III. Continuous Process Vents	21
A.1. Summary of All Applicable Continuous Process Vents	21
A.2. Group 2 Continuous Process Vents with a TRE ≥ 1.9 but < 5.0 for existing sources (< 8.0 for new sources)	22
B. Summary of Exempt Continuous Process Vents	22
Section IV. Batch Process Vents	23
A. Summary of Applicable Batch Process Vents	23
B. Summary of Exempt Batch Process Vents	24
C. Non-Reactive HAP Usage Alternative	24
D. Group 2 Batch Process Vents – Total Uncontrolled Emissions < 1,000 Lb/Yr – Reduced Recordkeeping	25
E. Process Condensers vs. Control Devices for Batch Process Vents / Initial Compliance Demonstration	26
F. Biofilters for Batch Process Vents	27

G. Results of Emission Profiles.....	28
H. Descriptions of worst-case operating and/or testing conditions for control devices for Batch Process Vents	29
Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP	30
A. Summary of Process Vents that Emit Hydrogen Halide and Halogen HAP.....	30
B. Using Engineering Assessment to Calculate Uncontrolled Hydrogen Halide / Halogen HAP Emissions.....	31
Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers.....	32
A. Summary of Applicable Storage Tanks	32
B. Summary of Exempt Storage Tanks, Surge Control Vessels, or Bottoms Receivers	33
C. Predominant Use Determination for Storage Tanks	34
D. Group 1 Storage Tanks Using Vapor Balancing Option.....	35
Section VII. Transfer Racks.....	36
A. Summary of Applicable Transfer Racks	36
B. Predominant Use Determination for Transfer Racks	37
Section VIII. Equipment Leaks – HON Subpart H	38
A. Component Count / Method of Compliance.....	38
B. Planned Schedule for Each Phase – Pumps and Valves.....	40
C. Batch Process Pressure Testing Alternative §63.178(b)	41
D. Alternative for Enclosed-Vented Process Units §63.179	41
E. Control Devices for Equipment Leaks	42
F. Other Alternative Means of Emission Limitation (General) §63.177	42
Section IX. Process Wastewater.....	43
A. Summary of Applicable Process Wastewater Streams.....	43
B. Summary of Exempt Process Wastewater Streams	44
C. Waste Management Unit Information	45
D. Treatment Process Information	46
E. Information on Residuals.....	47
F. Initial Compliance Demonstration – Control Devices Controlling Vent Emissions from WMUs.....	49
G. Fixed Roofs, Covers and Enclosures	51
Section X. Maintenance Wastewater	52
A. Summary of Applicable Maintenance Wastewater Streams	52
B. Summary of Exempt Maintenance Wastewater Streams.....	52
Section XI. Liquid Streams in Open Systems	53

A. Summary of Equipment Handling Liquid Streams in Open Systems.....	53
B. Summary of Equipment Exempt from the Requirements for Liquid Stream in Open Systems	54
Section XII. Heat Exchange Systems	55
A. Summary of Applicable Heat Exchange Systems.....	55
B. Summary of Exempt Heat Exchange Systems	55
Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process.....	56
A. General Information	56
B. Routing Emissions to a Process or Fuel Gas System.....	57
C. Routing Emissions from Storage Tank and Low Throughput Transfer Racks to a NonFlare Control Device and / or Halogen Reduction Device	58
D. Routing Emissions from Process Vent and Transfer Racks (Excluding Low Throughput) to a Nonflare Control Device and/or Halogen Reduction Device.....	59
E. Routing Emissions to a Flare.....	60
F. Recovery Devices for Maintaining TRE above a Specified Level.....	61
Section XIV. Continuous Emissions Monitoring Systems (CEMS)	62
A. CEMS Performance Evaluation	62
B. Alternative Standard.....	62

Section I. General Information

A. General Information

Print or type the following information for each facility for which you are making notification of compliance status:

Operating Permit Number (OPTIONAL)		Facility I.D. Number (OPTIONAL)	
		039-00618	
Owner or Operator Name / Title (e.g. Responsible Official)		Phone Number	
William E. Greenfield/Production Leader		Phone: (304) 747-3131	
Mailing Address of Owner or Operator			
P. O. Box 8361 Building 300			
City	State	ZIP Code	
South Charleston	West Virginia	25303	
Facility Name			
Univation Technologies LLC South Charleston Catalyst Plant: OMU3 Process			
Facility Street Address (If different than Responsible Official's Mailing Address)			
1100 Science Park Drive South Charleston, West Virginia			
Facility Local Contact Name (to whom inquiries should be addressed)		Title	Phone
Freddie A. Sizemore		Environmental Specialist	(304) 747-3713
City	State	ZIP Code	
South Charleston	West Virginia	25303	

MCPU Report

Control Device Only Report – Complete Sections II.B, VIII, IX.D, IX.F, XIII, XIV, as applicable.

Continued on next page

Section I. General Information, Continued

B. Operating Scenarios

Attach a description of each operating scenario for the MCPU:

Note: Much of the information required to be documented for operating scenarios as specified in 63.2525(b) is located in other parts of this Notification of Compliance Status. In the "Description of Operating Scenarios" form, corresponding sections in the NOCS are provided.

Operating Scenario Description	Attachment #
Normal Process Operations	Attachment OMU3-01

[63.2520(d)(2)(iv), 63.2525(b)]

C. Recordkeeping Exemption

Section 63.2525(e)(1) provides a recordkeeping exemption for each process with:

- Group 2 batch process vents or
- uncontrolled hydrogen halide and halogen HAP emission from the sum of all batch and continuous process vents < 1,000 lb/yr.

for any of the situations described below as long as this documentation is included in the notification of compliance status.

Indicate if any of the situations described below apply to your MCPU:

- Not Applicable
- The MCPU does not process, use or generate HAP.
- Group 2 batch process vents are controlled using a flare that meets the requirements of §63.987.
- Group 2 batch process vents are controlled using a control device for which the determination of worst case for initial compliance includes the contribution of all Group 2 batch process vents.

[63.2525(e)(1)]

Continued on next page

Section I. General Information, Continued

D. Changes to the Application for Approval of Construction or Reconstruction

Section 63.5(d)(1)(iii) of Subpart A requires that if an owner or operator submits estimates or preliminary information in place of the actual emissions data and analysis required in the application for approval of construction or reconstruction, then the actual, measured emission data and other correct information shall be submitted as soon as available but not later than with the notification of compliance status.

Did you submit an application for construction or reconstruction under §63.5(d) that contained preliminary or estimated data?

<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Not applicable - No construction or reconstruction occurred on or after 4/4/02.
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If you answered yes and if any of the information is substantially different upon startup of the project, THEN resubmit the updated information with the Notification of Compliance Status.

<input type="checkbox"/> Applicable	The information supplied in the Application for Approval of construction or Reconstruction is not substantially different upon startup of the project.
<input type="checkbox"/> Applicable.	See Attachment _____ for the revised information. (Attach a Supplemental Application for Approval of Construction or Reconstruction)

[§63.5(d)(1)(iii), (d)(1)(ii)(H), (d)(2), 63.9(h)(5)]

Section II: Regulatory Overlap

Introduction

For any equipment, emission stream, or wastewater stream subject to the MON and another federal rule, you may elect to comply only with the provisions as specified in this section. You also must identify the subject equipment, emission stream, or wastewater stream, and the provisions with which you will comply.

Check all options that apply and list the specific stream and the rule that you will follow in the table below.

[63.2520(d)(2)(vi), 63.2535]

A. Batch Process Vents Part of HON CPU

If you have an MCPU that includes a batch process vent that also is part of a CPU as defined in HON, 40 CFR 63 Subparts F and G, you must:

- Comply with the emission limits; operating limits; work practice standards; and the compliance, monitoring, reporting, and recordkeeping requirements for batch process vents in the MON, and
- Continue to comply with the requirements in subparts F, G, and H of this Part 63 that are applicable to the CPU and associated equipment.

[63.2535(a)(1)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have a batch process vent that is part of a HON CPU.
<input type="checkbox"/> Applicable	The MCPU includes batch process vent(s) that is(are) also part of a HON CPU. This(These) batch process vent(s) will comply with the emission limits; operating limits; work practice standards; and the compliance, monitoring, reporting, and recordkeeping requirements for batch process vents in 40 CFR 63 Subpart FFFF. The process unit will also continue to comply with HON Subparts F, G, and H that are applicable to the CPU and associated equipment. Identify batch process vents below: •

Continued on next page

Section II: Regulatory Overlap, Continued

B. Regulatory Overlap with 40 CFR parts 264 and 265, subparts AA, BB, and/or CC (Control Devices)

Identify which compliance option has been chosen for any control device subject to MON that is also subject to RCRA - 40 CFR part 264 / 265, subpart AA, BB, or CC.

[63.2535(b)(1)]

<input checked="" type="checkbox"/> Not Applicable	40 CFR 264 / 265 Subparts AA, BB, or CC are not applicable to any control devices used to comply with MON.
<input type="checkbox"/> Applicable	<i>Option 1:</i> The control device { } will comply with the monitoring, recordkeeping, and reporting requirements of the MON, 40 CFR 63 Subpart FFFF.
<input type="checkbox"/> Applicable	<i>Option 2:</i> The control device { } will comply with the monitoring and recordkeeping requirements in 40 CFR part 264 or 265 and the reporting requirements in 40 CFR part 264, which shall constitute compliance with the monitoring, recordkeeping and reporting requirements of the MON, 40 CFR 63 Subpart FFFF. All excursions will be reported as required by §63.2520(e).

C. Regulatory Overlap with 40 CFR Part 264 / 265 Subpart BB (Equipment Leaks)

Identify which compliance option has been chosen for equipment that is subject to MON and also subject to 40 CFR 264, subpart BB or to 40 CFR part 265, subpart BB (RCRA BB).

[63.2535(b)(2), 264/265.1064(m)]

<input checked="" type="checkbox"/> Not Applicable	40 CFR 264 / 265 Subparts BB is not applicable to any equipment subject to MON.
<input type="checkbox"/> Applicable	Equipment in the MON MCPU will comply with both MON, 40 CFR 63 Subpart FFFF, and continue to comply with the recordkeeping and reporting requirements of 40 CFR parts 264 and/or 265.
<input type="checkbox"/> Applicable	Compliance with the recordkeeping and reporting requirements of 40 CFR parts 264 and/or 265 is used to comply with the recordkeeping and reporting requirements of the MON, to the extent that the requirements of 40 CFR parts 264 and/or 265 duplicate the requirements of the MON.
<input type="checkbox"/> Applicable	Some equipment within the MON MCPU is subject to both 40 CFR 264 or 265 Subpart BB and MON. As allowed by §264.1064(m) and §265.1064(m), the MON MCPU is electing to determine compliance with RCRA BB for this equipment by documentation of compliance with the MON.

Continued on next page

Section II: Regulatory Overlap, Continued

D. Compliance with 40 CFR Part 60, Subpart Kb or 40 CFR Part 61, Subpart Y (Storage Tanks)

Identify any storage tanks that are assigned to an MCPU and that are both controlled with a floating roof and in compliance with the provisions of either 40 CFR Part 60, subpart Kb or 40 CFR Part 61, Subpart Y.

You are in compliance with the MON if you have a storage tank with a fixed roof, closed-vent system, and control device in compliance with the provisions of either 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y, except that you must comply with the monitoring, recordkeeping, and reporting requirements in the MON.

Alternatively, if a storage tank assigned to an MCPU is subject to control under 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y, you may elect to comply only with the requirements for Group 1 storage tanks in the MON.

[63.2535(c)]

<input checked="" type="checkbox"/> Not Applicable	Process unit has no storage tanks or only Group 2 storage tanks.
<input type="checkbox"/> Not Applicable	Process unit has Group 1 storage tank(s) but none are subject to 40 CFR Part 60, subpart Kb or 40 CFR 61, subpart Y.
<input type="checkbox"/> Applicable	Process unit has a Group 1 storage tanks that are assigned to the MCPU and that are both controlled with a floating roof and in compliance with the provisions of either 40 CFR Part 60, subpart Kb or 40 CFR Part 61, Subpart Y. Compliance with these rules for floating roof tanks constitutes compliance with the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs and to which subpart the tanks is(are) subject. •
<input type="checkbox"/> Applicable	Process unit has Group 1 storage tank(s) with a fixed roof, closed-vent system, and control device in compliance with the provisions of either 40 CFR Part 60, subpart Kb, or 40 CFR Part 61, subpart Y. Compliance with either of the rules constitutes compliance with the MON, except the process unit will comply with the monitoring, recordkeeping, and reporting requirements in the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs and to which subpart the tanks is(are) subject. •
<input type="checkbox"/> Applicable	Process unit has Group 1 storage tank(s) subject to control under 40 CFR Part 60, subpart Kb or 40 CFR Part 61, subpart Y, but is electing to comply only with the requirements for Group 1 storage tanks in the MON, 40 CFR Part 63, Subpart FFFF. List tank IDs: •

Continued on next page

Section II: Regulatory Overlap, Continued

E. Compliance with Subpart I, GGG, or MMM (Equipment Leaks)

Identify the compliance option chosen if you have a MON affected source with fugitive equipment (e.g. pumps, compressors, agitators, valves, etc.) subject to 40 CFR 63 Subparts I, GGG, or MMM.

[63.2535(d)]

<input checked="" type="checkbox"/> Not Applicable	Process unit has no equipment subject to: <ul style="list-style-type: none"> • 40 CFR 63 Subpart I (National Emission Standards for Organic Hazardous Air Pollutants for Certain Processes Subject to the Negotiated Regulation for Equipment Leaks) • 40 CFR 63, Subpart GGG (Pharma MACT), or • 40 CFR 63, Subpart MMM (Pesticides Active Ingredient Production MACT)
<input type="checkbox"/> Applicable	Process unit has equipment subject to subject to 40 CFR 63 Subparts I, GGG (Pharma MACT), or MMM (Pesticides Active Ingredient Production MACT). <input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart I. Equipment within the MCPU will comply with the provisions of 40 CFR 63 Subpart H as referenced by 40 CFR 63, Subpart I. <input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart GGG. Equipment within the MCPU will comply with the provisions of 40 CFR 63, Subpart GGG. <input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart MMM. Equipment within the MCPU will comply with the provisions of 40 CFR 63, Subpart MMM. <input type="checkbox"/> MCPU is subject to 40 CFR 63 Subpart I, GGG, or MMM. However, equipment within the MCPU will comply with the provisions of MON, 40 CFR 63, Subpart FFFF.

Continued on next page

Section II: Regulatory Overlap, Continued

F. Compliance with Subpart GGG (Pharma MACT) for Wastewater

Identify which compliance option is chosen if you have an affected source subject to MON, 40 CFR 63, Subpart FFFF, and you have an affected source that generates wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT).

[63.2535(e)]

<input checked="" type="checkbox"/> Not Applicable	MCPU has no wastewater subject to 40 CFR 63, Subpart GGG (Pharma MACT).
<input type="checkbox"/> Not Applicable	MCPU does not generate wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT).
<input type="checkbox"/> Applicable	MCPU does generate wastewater streams that meet the applicability thresholds specified in §63.1256 of 40 CFR 63 Subpart GGG (Pharma MACT). MCPU is electing to comply with the provisions of MON, 40 CFR 63 subpart FFFF for all such wastewater streams. Identify wastewater streams below: •

G. Compliance with Subpart MMM (Pesticides MACT) for Wastewater

Identify which compliance option is chosen if you have an affected source subject to MON, 40 CFR 63, Subpart FFFF and you have an affected source that generates wastewater streams that meet the applicability thresholds specified in §63.1362(d) of 40 CFR 63 Subpart MMM (Pesticides Active Ingredient Production MACT).

[63.2535(f)]

<input checked="" type="checkbox"/> Not Applicable	MCPU has no wastewater subject to 40 CFR 63 Subpart MMM (PAIP MACT).
<input type="checkbox"/> Not Applicable	MCPU does not generate wastewater streams that meet the applicability thresholds specified in §63.1362(d) of 40 CFR 63 Subpart MMM (PAIP MACT).
<input type="checkbox"/> Applicable	MCPU does generate wastewater streams that meet the applicability thresholds specified in §§63.1362(d) of 40 CFR 63 Subpart MMM (PAIP MACT). MCPU is electing to comply with the provisions of MON, 40 CFR 63 subpart FFFF for all such wastewater streams (except that the 99 percent reduction requirement for streams subject to §63.1362(d)(10) still applies). Identify wastewater streams below: •

Continued on next page

Section II: Regulatory Overlap, Continued

H. Compliance with other regulations for wastewater

For Group 1 wastewater stream(s) that is(are) also subject to provisions in 40 CFR parts 260 through 272, identify the more stringent provisions of 40 CFR parts 260 through 272 with which you will comply and report the information and procedures used to make any stringency determinations.

[63.2535(g)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any Group 1 process wastewater streams.																				
<input type="checkbox"/> Not Applicable	The MCPU does have Group 1 process wastewater streams under the MON, but the wastewater stream(s) is(are) not subject to the provisions of 40 CFR parts 260 through 272.																				
<input type="checkbox"/> Applicable	{Identify Wastewater Stream} is a Group 1 process wastewater stream that is also subject to the provisions in 40 CFR parts 260 through 272. However, owner or operator of the MCPU is not electing to determine the more stringent requirements and will comply with both the provisions of 40 CFR parts 260 through 272 and the MON.																				
<input type="checkbox"/> Applicable -	<p>{Identify Wastewater Stream} is a Group 1 process wastewater stream that is also subject to the provisions in 40 CFR parts 260 through 272. The owner or operator of the MCPU is electing to comply with the following provisions of 40 CFR parts 260 through 272 that are determined to be more stringent than the requirements of MON.</p> <p>See attachment # ____ for information and procedures used to make stringency determinations.</p> <table border="1" style="margin-left: auto; margin-right: auto;"> <thead> <tr> <th rowspan="2">Requirements</th> <th colspan="2">More Stringent Requirements</th> </tr> <tr> <th>40 CFR Parts 260 through 272</th> <th>40 CFR 63 Subpart FFFF</th> </tr> </thead> <tbody> <tr> <td>Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)</td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> <tr> <td>Testing</td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> <tr> <td>Monitoring</td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> <tr> <td>Recordkeeping</td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> <tr> <td>Reporting</td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> </tbody> </table>	Requirements	More Stringent Requirements		40 CFR Parts 260 through 272	40 CFR 63 Subpart FFFF	Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)	<input type="checkbox"/>	<input type="checkbox"/>	Testing	<input type="checkbox"/>	<input type="checkbox"/>	Monitoring	<input type="checkbox"/>	<input type="checkbox"/>	Recordkeeping	<input type="checkbox"/>	<input type="checkbox"/>	Reporting	<input type="checkbox"/>	<input type="checkbox"/>
Requirements	More Stringent Requirements																				
	40 CFR Parts 260 through 272	40 CFR 63 Subpart FFFF																			
Control Requirements (e.g., design, operation, and inspection requirements for waste management units; numerical treatment standards; etc.)	<input type="checkbox"/>	<input type="checkbox"/>																			
Testing	<input type="checkbox"/>	<input type="checkbox"/>																			
Monitoring	<input type="checkbox"/>	<input type="checkbox"/>																			
Recordkeeping	<input type="checkbox"/>	<input type="checkbox"/>																			
Reporting	<input type="checkbox"/>	<input type="checkbox"/>																			

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Section II: Regulatory Overlap, Continued

**I. Compliance with
 40 CFR 60,
 Subparts DDD, III,
 NNN, or RRR
 (Process Vents)**

Identify which compliance option is chosen if you have an MCPU that contains equipment subject to the provisions of the MON that are also subject to the provisions of 40 CFR Part 60, subpart DDD, III, NNN, or RRR.

[63.2535(h)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any equipment that is subject to the provisions of 40 CFR Part 60, subpart DDD, III, NNN, or RRR.
<input type="checkbox"/> Applicable	<p>The MCPU does have equipment that are subject to the provisions of MON that are also subject to the provisions of:</p> <p> <input type="checkbox"/> 40 CFR Part 60, subpart DDD, <input type="checkbox"/> 40 CFR Part 60, subpart III, <input type="checkbox"/> 40 CFR Part 60, subpart NNN, or <input type="checkbox"/> 40 CFR Part 60, subpart RRR. </p> <p>Select one:</p> <p> <input type="checkbox"/> The MCPU is electing to apply MON to all such equipment in the MCPU. <ul style="list-style-type: none"> • All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with MON, will be considered as if they were organic HAP. • Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart DDD, III, NNN, or RRR, as applicable. </p> <p> <input type="checkbox"/> The MCPU is not electing to supersede NSPS DDD, III, NNN, RRR with the MON and will comply with both MON and the applicable NSPS subpart. </p>
<input type="checkbox"/> Applicable	<p>The MCPU does have equipment that are not subject to the provisions of MON, but are subject to the provisions of:</p> <p> <input type="checkbox"/> 40 CFR Part 60, subpart DDD, <input type="checkbox"/> 40 CFR Part 60, subpart III, <input type="checkbox"/> 40 CFR Part 60, subpart NNN, or <input type="checkbox"/> 40 CFR Part 60, subpart RRR. </p> <p>Select one:</p> <p> <input type="checkbox"/> The MCPU is electing to comply with the requirements for Group 1 process vents in the MON for such equipment. <ul style="list-style-type: none"> • All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with MON, will be considered as if they were organic HAP. • Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart DDD, III, NNN, or RRR, as applicable. </p> <p> <input type="checkbox"/> The MCPU is electing to comply only with the requirements of 40 CFR 60, subparts DDD, III, NNN and/or RRR. </p>

Continued on next page

Section II: Regulatory Overlap, Continued

J. Compliance with 40 CFR 61, Subpart BB (Transfer racks)

1. Identify any Group 1 transfer rack that is also subject to the provisions of 40 CFR Part 61, subpart BB. Group 1 transfer racks are required to comply only with MON.

Not Applicable – There are no Group 1 transfer racks.

Not Applicable – There are Group 1 transfer rack(s), but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable - There are Group 1 transfer rack(s) that are also subject to the provisions of 40 CFR Part 61, Subpart BB. These transfer rack(s) will comply only with the MON.

[63.2535(i)(1)]

2. Identify the compliance option chosen for any Group 2 transfer rack that is also subject to the control requirements of 40 CFR Part 61, subpart BB.

Not Applicable – There are no Group 2 transfer racks.

Not Applicable – There are Group 2 transfer rack(s), but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable – There are Group 2 transfer rack(s) that is(are) subject to the control requirements specified in §61.302 of 40 CFR Part 61, subpart BB. The MCPU is electing to comply with:

The requirements of 40 CFR Part 61, subpart BB, or

The requirements for Group 1 transfer racks under MON, Subpart FFFF.

[63.2535(i)(2)(i)]

3. Identify the compliance option chosen for any Group 2 transfer rack that is subject only to the reporting and recordkeeping requirements of 40 CFR Part 61, subpart BB.

Not Applicable – There are no Group 2 transfer racks.

Not Applicable – There are Group 2 transfer rack(s) but they are not subject to the provisions of 40 CFR Part 61, Subpart BB.

Applicable – There are Group 2 transfer rack(s) that is(are) subject to only to reporting and recordkeeping requirements specified under 40 CFR Part 61, subpart BB. The MCPU is complying:

Only with the requirements of the MON for Group 2 transfer racks and is exempt from the reporting and recordkeeping requirements in 40 CFR Part 61, subpart BB.

[63.2535(i)(2)(ii)]

Continued on next page

Section II: Regulatory Overlap, Continued

K. Compliance with 40 CFR 61, Subpart FF (Wastewater)

Identify which compliance option is chosen for a Group 1 or Group 2 wastewater stream that is also subject to the provisions of 40 CFR 61.342(c) through (h) (NESHAP FF), and is not exempt under 40 CFR 61.342(c)(2) or (3).

[63.2535(j)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU does not have any Group 1 or Group 2 wastewater streams.
<input type="checkbox"/> Not Applicable	The MCPU has Group 1 or Group 2 wastewater streams, but these streams (this stream) is not subject to the provisions of 40 CFR 61.342(c)-(h) of Subpart FF.
<input type="checkbox"/> Applicable	<p>The MCPU has Group 1 or Group 2 wastewater streams, that is(are) also subject to the provisions of 40 CFR 61.342(c) through (h).</p> <p><input type="checkbox"/> The MCPU is electing to comply only with the requirements for Group 1 wastewater streams in this subpart FFFF.</p> <p><input type="checkbox"/> The MCPU is electing to comply with both the requirements for Group 1 wastewater streams in this subpart FFFF and the requirements in 40 CFR 61, Subpart FF. List Group 1 wastewater streams complying with this option:</p> <ul style="list-style-type: none"> • <p><input type="checkbox"/> The MCPU has a Group 2 wastewater stream that is exempted from 40 CFR 61.342(c)(1) under 40 CFR 61.342(c)(2) or (3), and is required to comply only with the reporting and recordkeeping requirements specified in the MON for Group 2 wastewater streams, and is exempt from the requirements in 40 CFR Part 61, subpart FF. List Group 2 wastewater streams complying with this option:</p> <ul style="list-style-type: none"> •

Continued on next page

Section II: Regulatory Overlap, Continued

L. Compliance with 40 CFR 60, Subpart VV and 40 CFR 61, Subpart V (Equipment Leaks)

Identify which compliance option is chosen if you have an affected source with equipment that subject to MON and that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Not Applicable – The MCPU does not have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Applicable – The MCPU does have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. However, the MCPU will apply both MON and 40 CFR Part 60, subpart VV or Part 61, subpart V, as applicable.

Applicable – The MCPU does have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. The MCPU is electing to apply MON to all such equipment.

- All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with the MON, are considered as if they were organic HAP.
- Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart VV and 40 CFR Part 61, subpart V, as applicable.

[63.2535(k)]

Identify which compliance option is chosen if you have an affected source with equipment to which **MON does not apply**, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Not Applicable The MCPU does not have equipment that is also subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V.

Applicable – The MCPU does have equipment to which MON does not apply, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. However, the MCPU will only apply 40 CFR Part 60, subpart VV or Part 61, subpart V to such equipment, as applicable.

Applicable – The MCPU does have equipment to which MON does not apply, but which is subject to the requirements of 40 CFR Part 60, subpart VV, or 40 CFR Part 61, subpart V. The MCPU will elect to apply MON to all such equipment.

- All total organic compounds, minus methane and ethane, in such equipment for purposes of compliance with the MON, are considered as if they were organic HAP.
- Compliance with the provisions of MON will constitute compliance with 40 CFR Part 60, subpart VV and 40 CFR Part 61, subpart V, as applicable.

[63.2535(k)]

Continued on next page

Section II: Regulatory Overlap, Continued

M. Applicability of Process Units Included in a Process Unit Group

Identify which compliance option is chosen if the MCPU consists of nondedicated equipment that will operate on or after November 10, 2003 and for which the process unit group (PUG) option is chosen.

If the primary product of a process unit group (PUG) is determined to be material described in §63.2435(b)(1) (e.g. one that is subject to MON), then

- You must comply with the MON for each MCPU in the PUG.
- You may also elect to comply with MON for all other process units in the PUG, which constitutes compliance with other Part 63 rules.

If the primary product of the PUG is determined to be material not subject to MON, then you must comply with as follows:

- If the primary product is subject to subpart GGG of this Part 63, then comply with the requirements of subpart GGG for each MCPU in the PUG.
- If the primary product is subject to subpart MMM of this Part 63, then comply with the requirements of subpart MMM for each MCPU in the PUG.
- If the primary product is subject to any subpart in Part 63 other than subpart GGG or subpart MMM, then comply with the requirements of this subpart for each MCPU in the PUG.

[63.2535(l), 63.2520(d)(2)(ix)]

<input checked="" type="checkbox"/> Not Applicable	The MCPU consists of only dedicated equipment subject to MON.
<input type="checkbox"/> Not Applicable	The MCPU consists of nondedicated equipment that will operate on or after November 10, 2003; however, the process unit group (PUG) option will not be used.
<input type="checkbox"/> Applicable -	The MCPU consists of nondedicated equipment that will operate on or after November 10, 2003 that is also used within other nondedicated MCPU or other nondedicated processes expected to be operated in the 5 years after November 10, 2003. The following information identifies the applicable process unit group. Note: If choosing this option, then the NOCS for the applicable regulation should be amended to include the MCPU.

Continued on next page

Section II: Regulatory Overlap, Continued

M. Applicability of Process Not Applicable
 Units Included in a
 Process Unit Group
 (continued)

Process unit group:	
Primary product:	
Primary product is subject to: (specify which subpart)	<input type="checkbox"/> MON (40 CFR 63, subpart FFFF) <input type="checkbox"/> Pharma MACT (40 CFR 63, subpart GGG) or <input type="checkbox"/> Pesticides MACT (40 CFR 63, subpart MMM). <input type="checkbox"/> Another Part 63 Subpart not listed above.
Process unit group will comply with (specify which one):	<input type="checkbox"/> MON (40 CFR 63, subpart FFFF) <input type="checkbox"/> Pharma MACT (40 CFR 63, subpart GGG) or <input type="checkbox"/> Pesticides MACT (40 CFR 63, subpart MMM).
Attachment # for the primary product determination.	
<p>Note:</p> <ul style="list-style-type: none"> The primary product is the type of product (e.g., organic chemicals subject to §63.2435(b)(1), pharmaceutical products subject to §63.1250, or pesticide active ingredients subject to §63.1360) expected to be produced for the greatest operating time in the 5-year period specified in paragraph (I)(1)(ii) of this section. If the PUG produces multiple types of products equally based on operating time, then the primary product is the type of product with the greatest production on a mass basis over the 5-year period specified in paragraph (I)(1)(ii) of this section. At a minimum, you must redetermine the primary product of the PUG following the procedure specified in paragraphs (I)(2)(i) and (ii) of this section every 5 years. You must record the calculation of each redetermination of the primary product as specified in §63.2525(i)(5) and report the calculation in a compliance report submitted no later than the report covering the period for the end of the 5th year after cessation of production of the previous primary product, as specified in §63.2520(e)(8). 	

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Section II: Regulatory Overlap, Continued

N. Hierarchy Approach

Select which option you are using below when organic HAP emissions from different emission types (e.g., continuous process vents, batch process vents, storage tanks, transfer operations, and waste management units) are combined. If applicable, you must comply with the requirements of either options 1 or 2 below:

- Not applicable** – All emission points are Group 2 – no control is required.
- Not applicable** – OHAP emissions from different emission types are not combined.
- Applicable - Option #1** - Comply with the applicable requirements of the MON for each kind of organic HAP emissions in the stream (e.g. comply with applicable requirements for continuous process vents, batch process vents, storage tanks, transfer operations, and waste management units).
- Applicable - Option #2** - Determine the applicable requirements based on the hierarchy presented below. For a combined stream, the applicable requirements are specified in the highest-listed row in the hierarchy that applies to any of the individual streams that make up the combined stream. **Note:** You must comply with applicable monitoring, recordkeeping, and reporting requirements for the highest-listed emission point type.

Hierarchy	Emission Point Type
1	Group 1 batch process vents
2	Continuous process vent routed to a control device
3	Transfer Operations
4	Waste Management Units used to manage and treat Group 1 wastewater streams and residuals removed from Group 1 wastewater streams
5	Storage Tanks
6	Continuous process vents after a recovery device

If using Option #2, provide brief explanation of approach used:	
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[63.2450(c), 63.982(f)]

Section III. Continuous Process Vents

Introduction

This section provides the results of any continuous process vent applicability determinations, emission calculations, or analyses used to identify and quantify HAP emissions from the affected source.

A.1. Summary of All Applicable Continuous Process Vents

Complete the following table listing all continuous process vents and their corresponding control methods.

Not Applicable

(1) Continuous Process Vent ID	(2) Process Vent Description (From where does the process vent originate?)	(3) Existing or New Affected Source?	(4) HAPs Vented	(5) Designated as Group 1 Continuous Process Vent? (Yes / No)	(6) Aggregated with and complying as a Group 1 Batch Process Vent?	(7) Total Resource Effectiveness Index Value (Mark "N/A" if Vent Stream is designated as Group 1)	(8) Flow Rate (scmm) (Mark "N/A" if Vent Stream is designated as Group 1)	(9) Group 1 or Group 2 Process Vent?

For Group 1 Continuous Process Vents Only (and complete Section XIII as appropriate):

Not Applicable

(1) Continuous Process Vent ID	(10) Control Option Selected for HAP Emissions	(11) Control Device Type, if applicable	(12) Control Device ID, if applicable	(13) Is vent stream from continuous process vent halogenated, and are you using a combustion control device to control HAP emissions	(14) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section III. Continuous Process Vents, Continued

A.2 Group 2 Continuous Process Vents
 with a TRE \geq 1.9 but $<$ 5.0 for existing
 sources ($<$ 8.0 for new sources)

Not Applicable

(1) Continuous Process Vent ID	(2) Recovery Device Type, if applicable	(3) Recovery Device ID, if applicable

B. Summary of
 Exempt
 Continuous
 Process Vents

Complete the following table listing all exempt continuous process vents.

Not Applicable

(1) Process Vent ID	(2) Exemption Reason

Section IV. Batch Process Vents

Introduction

This section provides the results of any batch process vent applicability determinations, emission calculations, or analyses used to identify and quantify HAP emissions from the affected source.

A. Summary of Applicable Batch Process Vents

Complete the following table listing all batch process vents and their corresponding control methods.

Not Applicable

(1) Batch Process Vent ID	(2) Existing or New Affected Source?	(3) HAPs Vented	(4) Designated as Group 1 Batch Process Vent (Yes / No)	(5) Uncontrolled Organic HAP Emissions from Vent (Lb/yr) if not designated as a Group 1 Batch Process Vent	(6) Group 1 or Group 2 Batch Process Vent
K18 (Header)	Existing	2,2,4-Trimethyl Pentane*	No	471	Group 2
J01 (Header)	Existing	2,2,4-Trimethyl Pentane*	No	342	Group 2
Total Uncontrolled OHAP Emissions (Lb/Yr):				813 (Uncontrolled Emissions are routed to flare (L15))	

*HAPs vented could include trace amounts of Benzene, Cumene, Ethyl-benzene, Hexane, Naphthalene, Styrene, Toluene, and Xylenes that may be present in raw material as an impurity. The amount of these trace constituents is included in the uncontrolled emissions reported for 2,2,4-Trimethylbenzene listed above.

For Group 1 Batch Process Vents Only (and complete Section XIII as appropriate):

Not Applicable

(1) Batch Process Vent ID	(7) Control Option Selected for HAP Emissions	(8) Control Device Type, if applicable	(9) Control Device ID, if applicable	(10) Is vent stream from batch process vent halogenated and are you using a combustion control device to control HAP emissions	(11) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section IV. Batch Process Vents, Continued

B. Summary of Exempt Batch Process Vents

Complete the following table listing all exempt batch process vents.

Not Applicable

(1) Batch Process Vent ID	(2) Batch Process Vent Exemption

C. Non-Reactive HAP Usage Alternative

As an alternative to determining the uncontrolled HAP emissions as specified in 63.1257(d)(2)(i)-(ii) [Pharma MACT], you may elect to demonstrate that non-reactive organic HAP are the only HAP used in the process and non-reactive HAP usage in the process is less than 10,000lb/yr.

Not Applicable

If applicable, provide data and supporting rationale either in an attachment or in the space below explaining why the non-reactive organic HAP usage will be less than 10,000 lb/yr.

Attachment # _____

[63.2460(b)(7), 63.2525(e)(2)]

Continued on next page

Section IV. Batch Process Vents, Continued

D. Group 2 Batch Process Vents – Total Uncontrolled Emissions < 1,000 Lb/Yr – Reduced Recordkeeping

If the total uncontrolled organic HAP emission from batch process vents in a MCPU will be < 1,000 lb/yr for the anticipated number of standard batches, then §63.2525(e)(3) provides reduced recordkeeping (e.g. keep records of the number of batches operated and calculate a daily rolling annual sum of batches operated no less frequently than monthly).

- If the number of batches operated results in OHAP emissions that exceed 1,000 lb/yr, you must estimate emissions for the preceding 12 months based on the number of batches operated and the estimated emissions for a standard batch, and you must begin recordkeeping as required for other Group 2 batch process vents.
- After 1 year, you may revert to this reduced recordkeeping option if the number of batches operated during the year results in less than 1,000 lb/yr of OHAP emissions.

Indicate whether this reduced recordkeeping option applies to your MCPU.

Not Applicable

Applicable - The total uncontrolled organic HAP emission from batch process vents in a MCPU will be < 1,000 lb/yr for the anticipated number of standard batches. This MCPU will comply with the recordkeeping option provided in §63.2525(e)(3).

Description of standard batch	See OMU3 Normal Operating Scenario
Anticipated # of Standard Batches	
Total uncontrolled organic HAP emissions from batch process vents per batch (Lb/Batch)	
Total uncontrolled organic HAP emissions from batch process vents per year (Lb/Year)	

[§63.2525(e)(3)]

Continued on next page

Section IV. Batch Process Vents, Continued

E. Process Condensers vs. Control Devices for Batch Process Vents / Initial Compliance Demonstration	List all condensers associated with batch process vents below and indicate whether the condenser is a control device for a batch process vent or a process condenser. Attach: <ul style="list-style-type: none"> • supporting rationale as to why the condenser is a control device vs. a process condenser for a batch process vent and • the initial compliance demonstration for each process condenser. <p style="text-align: center;"><i>[§63.2460(c)(1), (c)(2)(v), §63.1257(d)(2)(i)(C)(4)(ii), §63.1257(d)(3)(iii)(B)]</i></p>
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- Not Applicable - MCPU does not have any condensers associated with batch process vents.
- Applicable - MCPU has condensers associated with batch process vents that are either control devices or process condensers. See the table below.

Condenser ID	Process Condenser or Control Device?	Supporting Rationale as to Why Condenser is a Process Condenser or Control Device (Attachment #)	For process condensers, attach initial compliance demonstration (Attachment #)	For process condensers exempt from the initial compliance demonstration, indicate reason for exemption. See codes below.

Process Condensers – Exemptions from Initial Compliance Demonstration:

- A. Process condenser is followed by a secondary condenser that is an air pollution control device.
 B. Process condenser is followed by an air pollution control device that is meeting the alternative standard.

Continued on next page

Section IV. Batch Process Vents, Continued

<p>F. Biofilters for Batch Process Vents</p>	<p>If you use a biofilter to meet either the 95% reduction requirement or outlet concentration requirement for batch process vents, THEN you may elect to:</p> <ul style="list-style-type: none"> • Monitor the biofilter bed temperature using multiple thermocouples in representative locations throughout the biofilter bed and • Calculate the average biofilter bed temperature across these thermocouples prior to reducing the temperature data to 15 minute (or shorter) averages for purposes of establishing operating limits for the biofilter. <p>If you use multiple thermocouples, include your rationale for their site selection this section.</p> <p style="text-align: right;"><i>[§63.2460(c)(9)(ii)(C)]</i></p>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have a biofilter.
<input type="checkbox"/> Not Applicable -	MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents, but the biofilter bed temperature is not monitored.
<input type="checkbox"/> Applicable -	MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents. The biofilter bed temperature is not monitored using multiple thermocouples.
<input type="checkbox"/> Applicable -	MCPU does use a biofilter to meet the 95% reduction requirement or outlet concentration limit for batch process vents. The biofilter bed temperature is monitored using multiple thermocouples in representative locations throughout the biofilter bed. See Attachment # _____ for the rationale for their site selection.

Continued on next page

Section IV. Batch Process Vents, Continued

G. Results of Emission Profiles	<p>Submit the results of emissions profiles for Group 1 batch process vents when you conduct a performance test or design evaluation for a non-flare control device used to control emissions from batch process vents.</p> <p>§63.2515(c) requires submittal of the emission profile with the notification of performance test (if performance testing is applicable) for any performance test required as part of the initial compliance procedures for batch process vents. The emission profile is also required to be submitted as part of the NOCS when you conduct a performance test or design evaluation for Group 1 batch process vents routed to a non-flare control device as specified in §63.2520(b)(2)(ii).</p> <p style="text-align: right;"><i>[§63.2460(b)(5), (c)(2)(ii), §63.2515(c), §63.2520(d)(2)(ii), §63.1257(b)(8)]</i></p>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have any Group 1 batch process vents.
<input type="checkbox"/> Not Applicable -	MCPU does have Group 1 batch process vents but is either: <ul style="list-style-type: none"> <input type="checkbox"/> Electing to comply with the alternative standard, §63.2505. <input type="checkbox"/> Complying with the emission limits for batch process vents using a flare. OR <ul style="list-style-type: none"> <input type="checkbox"/> Routing emissions to a control device that is exempt from performance testing under §§63.985(b)(2) or 63.988(b)(2) of Subpart SS. The control device(s) {Control Device IDs} is/are: <ul style="list-style-type: none"> <input type="checkbox"/> A hazardous waste incinerator that has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, subpart O, or has certified compliance with the interim status requirements of 40 CFR part 265, subpart O; <input type="checkbox"/> A boiler or process heater with a design heat input capacity of 44 megawatts (150 million British thermal units per hour) or greater; <input type="checkbox"/> A boiler or process heater into which the vent stream is introduced with the primary fuel or is used as the primary fuel; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has certified compliance with the interim status requirements of 40 CFR part 266, subpart H.
<input type="checkbox"/> Applicable -	MCPU does have Group 1 batch process vents routed to a non-flare control device. See Attachment # _____ for the: <ul style="list-style-type: none"> <input type="checkbox"/> Emission profile by process <input type="checkbox"/> Emission profile by equipment <input type="checkbox"/> Emission profile by capture and control device limitation. <p>Note: Attach Form: <u>Emission Profiles and Testing Conditions for Batch Process Vents.</u></p>

Continued on next page

Section IV. Batch Process Vents, Continued

H. Descriptions of worst-case operating and/or testing conditions for control devices for Batch Process Vents	For each non-flare control device controlling emissions from Group 1 batch process vents, submit descriptions of worst-case operating and/or testing conditions for the design evaluation and/or performance test. <div style="text-align: right;"><i>[\$63.2520(d)(2)(v)]</i></div>
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<input checked="" type="checkbox"/> Not Applicable -	MCPU does not have any Group 1 batch process vents.
<input type="checkbox"/> Not Applicable -	MCPU does have Group 1 batch process vents but is either: <ul style="list-style-type: none"> <input type="checkbox"/> Electing to comply with the alternative standard. <input type="checkbox"/> Complying with the emission limits for batch process vents using a flare. OR <input type="checkbox"/> Routing emissions to a control device that is exempt from performance testing under §§63.985(b)(2) or 63.988(b)(2) of Subpart SS. The control device(s) {Control Device IDs} is/are: <ul style="list-style-type: none"> <input type="checkbox"/> A hazardous waste incinerator that has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, subpart O, or has certified compliance with the interim status requirements of 40 CFR part 265, subpart O; <input type="checkbox"/> A boiler or process heater with a design heat input capacity of 44 megawatts (150 million British thermal units per hour) or greater; <input type="checkbox"/> A boiler or process heater into which the vent stream is introduced with the primary fuel or is used as the primary fuel; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H; or <input type="checkbox"/> The boiler or process heater burns hazardous waste and has certified compliance with the interim status requirements of 40 CFR part 266, subpart H.
<input type="checkbox"/> Applicable -	MCPU does have Group 1 batch process vents routed to a non-flare control device. See table below for a description of the absolute or hypothetical worst case conditions for each control device. Also refer to Section IV.G. for results of emission profiles and testing conditions for batch process vents for more detailed information.

Control Device ID:	
<input type="checkbox"/> Description of Absolute Worst Case Conditions –	
<input type="checkbox"/> Description of Hypothetical Worst Case Conditions –	

Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP

Introduction

This section provides the results of any applicability determinations, emission calculations, or analyses used to identify and quantify hydrogen halide and halogen HAP emissions (or emissions of HAP metals for new sources) from the affected source.

A. Summary of Process Vents that Emit Hydrogen Halide and Halogen HAP

List all continuous and batch process vents that emit hydrogen halide or halogen HAP. For new sources only, copy the table below but list HAP metals. Complete Section XIII as appropriate.

Note: Control is not required if uncontrolled hydrogen halide and halogen HAP emissions from process vents is < 1000 lb/yr.

Not Applicable

[§63.2465(b)]

(1) Process Vent ID	(2) Process Vent Description (From where does the process vent originate?)	(3) Batch Process Vent (BPV) or Continuous Process Vent (CPV)?	(4) Hydrogen halides and Halogen HAPs Vented	(5) Uncontrolled Mass Emission Rate of Hydrogen halide and Halogen HAP Emissions (Lb/yr) (HCl, HF, Cl2)	(6) Control Option Selected for Hydrogen Halide and Halogen HAP (or HAP metals for new sources)	(7) Control Device Type, if applicable	(8) Control Device ID, if applicable
Total Uncontrolled Emission Rate of Hydrogen Halide / Halogen HAPs:							

Continued on next page

Section V. Process Vents that Emit Hydrogen Halide and Halogen HAP, Continued

B. Using Engineering Assessment to Calculate Uncontrolled Hydrogen Halide / Halogen HAP Emissions

If opting to using engineering assessment to calculate the sum of uncontrolled hydrogen halide / halogen HAP emissions from each of the process vents within the process [§63.1257(d)(2)(i)] instead of the emission estimation procedures for batch vents [§63.1257(d)(2)(ii)], provide the data or other information supporting the finding that the emission estimation equations are inappropriate.

- Not Applicable – Uncontrolled hydrogen halide / halogen HAP emissions are designated to be > 1,000 lb/yr without calculating emissions.
- Not Applicable – The requirements for process vents that emit hydrogen halide and halogen HAP are not applicable to this MCPU.
- Not Applicable – The requirements for process vents that emit hydrogen halide and halogen HAP are applicable to this MCPU, but the emission estimation procedures for batch vents in 63.1257(d)(2)(i) are used to calculate the uncontrolled emissions.
- Applicable – Engineering assessment is used to calculate the sum of uncontrolled hydrogen halide / halogen HAP emissions from the process vents listed below. See the attached supporting information below.

[§63.2465(b), 63.1257(d)(2)(ii), (d)(2)(ii)(E)]

(1) Process Vent ID	(2) Data or other information supporting a finding that the emissions estimation equations are inappropriate.	(3) Engineering Assessment Attachment #
	•	

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers

Introduction

This section provides the results of any storage tank applicability determinations.

A. Summary of Applicable Storage Tanks

Complete the following table listing all storage tanks and their corresponding control methods. Also include surge control vessels and bottoms receivers that meet the capacity and vapor pressure thresholds for a Group 1 storage tank.

Not Applicable

(1) Storage Tank / Surge Control Vessel / Bottoms Receiver - Vessel ID	(2) Type of Tank (Storage Tank, Surge Control Vessel or Bottoms Receiver)	(3) HAPs Stored	(4) Actual Capacity (gallons)	(5) Actual Maximum True Vapor Pressure of Total HAP at Storage Temperature (psia)	(6) Actual Maximum True Vapor Pressure of Total HAP at Storage Temperature (kPa) - converted	(7) Existing or New Affected Source?	(8) Group 1 or Group 2 Storage Tank?

For Group 1 Storage Tanks or Surge Control Vessels / Bottoms Receivers Subject to Control Only (and complete Section XIII as appropriate):

Not Applicable

(1) Storage Tank / Vessel ID (contd.)	(9) Control Option Selected for HAP Emissions	(10) Control Device Type, if applicable	(11) Control Device ID, if applicable	(12) Is vent stream from storage tank halogenated and are you using a combustion control device to control HAP emissions	(13) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

B. Summary of Exempt Storage Tanks, Surge Control Vessels, or Bottoms Receivers

Complete the following table listing all exempt storage tanks and surge control vessels or bottoms receivers that are not subject to control.

Not Applicable

(1) Tank / Vessel ID	(2) Tank / Vessel Type (Storage Tank, Surge Control Vessel or Bottoms Receiver)	(3) HAPs or non-HAPs Stored	(4) Exemption Reason

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

C. Predominant Use Determination for Storage Tanks

For those storage tanks (including storage tanks in series) for which the predominant use varies from year to year, provide the predominant use determination in the table below or reference an attachment that includes the supporting information stating how the determination was made. **[§63.2435(d)]**

Applicability	Storage Tank ID	Description	Supporting Documentation (Attachment #)
<input checked="" type="checkbox"/> Not Applicable	N/A	The MCPU does not have any storage tanks.	
<input type="checkbox"/> Not Applicable		The storage tank is(are) dedicated to this MCPU.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This storage tank is shared among process units. The predominant use of the storage tank is associated with a miscellaneous organic chemical manufacturing process, and the storage tank is not a part of an affected source under another Part §63 subpart. Therefore, the storage tank is assigned to the MCPU for that process.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This storage tank is shared among process units. The predominant use cannot be determined. Therefore, the storage tank is assigned to any MCPU that shares it and is subject to the MON. MCPU: <input type="text"/>	No supporting documentation required.
<input type="checkbox"/> Applicable		This storage tank is shared among process units. Predominant use determination is based on utilization that occurred during the year preceding November 10, 2003. Primary use will be redetermined at least once every 5 years.	Attachment #
<input type="checkbox"/> Applicable		This storage tank is shared among process units. The storage tank was not in operation during the year preceding November 10, 2003. The predominant use determination is based on the expected use for the first 5-year period after startup. Primary use will be redetermined at least once every 5 years.	Attachment #

Continued on next page

Section VI. Storage Tanks, Surge Control Vessels or Bottoms Receivers, Continued

D. Group 1 Storage Tanks Using Vapor Balancing Option

If complying with the vapor balancing alternative for affected storage tanks (§63.2470(e)), list the specific tanks following the vapor balancing alternative and check all that apply.

Not Applicable – Not using the vapor balancing alternative in §63.2470(e) for Group 1 storage tanks.

Applicable – Using the vapor balancing alternative in §63.2470(e) for Group 1 storage tanks.

[§63.2520(d)(2)(viii), §63.2470(e), §63.1253(f)]

Storage Tank IDs	Check all that apply:
	<input type="checkbox"/> The pressure vent settings on the affected storage tanks are greater than or equal to 2.5 psig.
	<input type="checkbox"/> Electing to set a pressure relief device associated with these storage tanks to a value less than the 2.5 pounds per square inch gauge pressure (psig). The rationale explaining why the alternative value is sufficient to prevent breathing losses at all times is included in Attachment XX.
	<input type="checkbox"/> Using the vapor balancing alternative for Group 1 storage tanks. The reloading / cleaning facility uses: <ul style="list-style-type: none"> • A closed-vent system and control device that reduces inlet emissions of HAP by 95% wt or greater and complies with the MON, §§63.2445 through §63.2550. Note: The reporting requirements on §§63.2520 do not apply to the owner or operator of the offsite cleaning or reloading facility.
	<input type="checkbox"/> Using the vapor balancing alternative for Group 1 storage tanks. The reloading / cleaning facility uses: <ul style="list-style-type: none"> • A vapor balancing system designed and operated to collect OHAP vapor displaced from the tank truck or railcar during reloading and routes the collected HAP vapor to the storage tank from which the liquid being transferred originated.
	<input type="checkbox"/> Using vapor balancing alternative for Group 1 storage tanks AND an offsite reloading or cleaning facility. Records and reports will be maintained by the offsite reloading or cleaning facility under {40 CFR §63 Subpart XXXX} as alternative to complying with the monitoring, recordkeeping, and reporting provisions in the MON, §§63.2445 through §63.2550 as allowed by §§63.2535(a)(2).

Continued on next page

Section VII. Transfer Racks

Introduction

This section provides the results of any transfer rack applicability determinations.

A. Summary of Applicable Transfer Racks

Complete the following table listing all transfer racks and their corresponding control methods.

Not Applicable

(1) Transfer Rack ID	(2) Truck or Railcar?	(3) HAPs Loaded	(4) Rack Weighted Average Partial Pressure of Liquids Containing OHAP (psia)	(5) Annual Volume of Organic Liquid Loaded (Gallons/Year)	(6) Group 1 or Group 2 Transfer Rack?
Not Applicable - OHAP containing materials are not loaded into tank trucks and/or rail cars					

For Group 1 Transfer Racks Only:

Not Applicable

(1) Transfer Rack ID, contd.	(7) Control Option Selected for HAP Emissions	(8) Control Device Type, if applicable	(9) Control Device ID, if applicable	(10) Is vent stream from transfer rack halogenated, and are you using a combustion control device to control HAP emissions	(11) If halogenated vent and you are using a combustion device, which control option is selected for halogenated vent stream provisions

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Section VII. Transfer Racks, Continued

B. Predominant Use Determination for Transfer Racks

For those transfer rack loading arms for which the predominant use varies from year to year, provide the predominant use determination in the table below or reference an attachment that includes the supporting information stating how the determination was made. **[§63.2435(d)]**

Applicability	Transfer Rack ID	Description	Supporting Documentation (Attachment #)
<input checked="" type="checkbox"/> Not Applicable	N/A	The MCPU does not have any transfer racks.	N/A
<input type="checkbox"/> Not Applicable		The transfer rack loading arm(s) is(are) dedicated to this MCPU.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This transfer rack loading arm is shared among process units. The predominant use of the transfer rack loading arm is associated with a miscellaneous organic chemical manufacturing process, and the loading arm is not a part of an affected source under another Part §63 subpart. Therefore, the loading arm is assigned to the MCPU for that process.	No supporting documentation required.
<input type="checkbox"/> Not Applicable		This transfer rack loading arm is shared among process units. The predominant use cannot be determined. Therefore, the transfer rack loading arm is assigned to any MCPU that shares it and is subject to the MON. MCPU: <input type="text"/>	No supporting documentation required.
<input type="checkbox"/> Applicable		This transfer rack loading arm is shared among process units. Predominant use determinations is based on utilization that occurred during the year preceding November 10, 2003. Primary use will be redetermined at least once every 5 years.	Attachment #
<input type="checkbox"/> Applicable		This transfer rack loading arm is shared among process units. The transfer rack was not in operation during the year preceding November 10, 2003. The predominant use determination is based on the expected use for the first 5-year period after startup. Primary use will be redetermined at least once every 5 years.	Attachment #

Section VIII. Equipment Leaks – HON Subpart H

A. Component Count / Method of Compliance

Batch Process Pressure Testing Alternative Used

The table below includes the number of each equipment type excluding equipment in vacuum service and the method of the compliance with the standard.

Not Applicable

[§63.2520(d)(2)(vii), §63.182(c)(1)(ii)-(iii)]

Equipment Type	Number	Method of Compliance
Pumps in light liquid service:	0	§63.1§63(b) Monthly leak detection and repair
	0	§63.163(e) Dual mechanical seal system.
	0	§63.163(f) No externally actuated shaft.
	0	§63.163(g) Equipped with closed vent system.
	0	§63.163(h) Within boundary of an unmanned plant site.
	0	§63.163(j) Unsafe-to-monitor pumps. Monitor when safe.
	TOTAL:	NA
Compressors:	0	§63.164(a) Equipped with required seal system.
	0	§63.164(h) Equipped with closed vent system.
	0	§63.164(i) Operate at <500 ppm above background.
	TOTAL:	NA
Pressure relief devices in gas/vapor service:	2	§63.165(a) Operate at <500 ppm above background.
	0	§63.165(c) Routed to process / fuel gas or closed vent system
	0	§63.165(d) Equipped with upstream rupture disk.
	TOTAL:	2
Sampling connection systems:	0	§63.166(b)(1) Return purge to process line.
	0	§63.166(b)(2) Collect and recycle purge to a process.
	0	§63.166(b)(3) Capture and transport to control device.
	0	§63.166(b)(4)(i) Collect, store, transport to HON WMU
	0	§63.166(b)(4)(ii) Collect, store, transport to TSD facility
	0	§63.166(b)(4)(iii) Collect, store, transport to a non-haz. waste facility
	0	§63.166(c) <i>In-situ</i> sampling system or without purge
	TOTAL:	0
Open-ended valves or lines:	0	§63.167(d) Part of emergency shutdown system.
	0	§63.167(e) Contains polymerizing, explosive or hazardous materials.
	TOTAL:	NA Note: Open-ended valves are equipped with a cap, plug, blind flange, or 2 nd valve. These fittings are included in the connector/valve population and are monitored if required by other applicable regulation.

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

Introduction (continued)

Equipment Type	Number	Method of Compliance
Valves in gas/vapor or in light liquid service:	0	§63.168(a)(3) Annual leak detection and repair.
	0	§63.168(a)(3) Semi-annual leak detection and repair.
	0	§63.168(b) Quarterly leak detection and repair.
	0	§63.168(h) Unsafe-to-monitor.
	0	§63.168(i) Difficult-to-monitor.
TOTAL:	NA	
Pumps in heavy liquid service:	N/A	§§63.169(a) Observe for leak by sensory methods; Monitor and/or repair. The work practice is identify equipment in heavy liquid service by the use of facility's P&ID's.
Valves in heavy liquid service:		
Connectors in heavy liquid service:		
Agitators in heavy liquid service:		
Instrumentation systems:	0	§63.169(a) Observe for leak by sensory methods; Monitor and/or repair.
Pressure relief devices in liquid service:	0	§63.169(a) Observe for leak by sensory methods; Monitor and/or repair.
TOTAL:	NA	
Closed vent systems and control devices:	0	§63.172(f)(1) Annual visual inspection (hard-piped).
	0	§63.172(f)(2) Annual monitoring (duct work).
	0	§63.172(k) Unsafe-to-inspect.
	0	§63.172(l) Difficult-to-inspect
TOTAL:	NA	
Agitators in gas/vapor service or in light liquid service:	0	§63.173(a) Monthly leak detection and repair.
	0	§63.173(d) Equipped with dual mechanical seal system.
	0	§63.173(e) No externally actuated shaft.
	0	§63.173(f) Equipped with closed vent system
	0	§63.173(g) Within boundary of an unmanned plant site.
	0	§63.173(h) Difficult-to-monitor.
	0	§63.173(i) Obstructed.
	0	§63.173(j) Unsafe-to-monitor.
TOTAL:	NA	

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

Introduction (continued)

Equipment Type	Number	Method of Compliance
Connectors in gas/vapor service or in light liquid service.	N/A	§63.174(b) Annual leak detection and repair.
	N/A	§63.174(b)(4) Biennial leak detection and repair.
	N/A	§63.174(b)(4) Quadrennial leak detection and repair.
	N/A	§63.174(c)(2) Screwed connectors ≤ 2" installed prior to 12/31/92.
	N/A	§63.174(f) Unsafe-to-monitor.
	N/A	§63.174(g) Unsafe-to-repair.
	N/A	§63.2480(b)(4) --> §63.169 for connectors in heavy liquid service.
TOTAL:	NA	Note: §63.2480(b)(4) of MON allows you to elect to comply with the requirements in §63.169 for connectors in heavy liquid service, including all associated recordkeeping and reporting requirements, rather than the requirements of §63.174.

B. Planned Schedule for Each Phase – Pumps and Valves

Not Applicable

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

C. Batch Process Pressure Testing Alternative §63.178(b)

Provide the batch products and batch product codes subject to the pressure testing alternative for batch processes and the planned schedule for pressure testing when the equipment is configured for production of products subject to MON. [§63.182(c)(2)]

Note: For MON purposes, the requirements for pressure testing in §63.178(b) may be applied to all processes, not just batch processes. [§63.2480(b)(1)]

Not Applicable – Not using the pressure testing alternative for batch processes.

Applicable – Will follow the pressure testing of batch product-process equipment to demonstrate compliance with Subpart H in lieu of complying with the monitoring provisions of §§63.163, 63.168 and §63.169, and 63.173 through 63.176 of Subpart H.

Batch (or Continuous) Product or Product Code	Planned Schedule for Pressure Testing
OMU3 Process	Annual

D. Alternative for Enclosed-Vented Process Units §63.179

For those process units complying with the alternative means of emission limitation for enclosed-vented process units, provide a description of the system to create negative pressure in the enclosure and the control device used to comply with the requirements of §63.172 of Subpart H. [§63.182(c)(3)]

Not Applicable – Not using the enclosed-vented process unit alternative in §63.179.

Applicable – Complying with the enclosed-vented process unit alternative in lieu of the requirements in §63.163 through 63.171 and 63.173, 63.174.

Description of system used to create negative pressure in the enclosure:	
Description of control device used to comply with the requirements of §63.172 of Subpart H.	

Continued on next page

Section VIII. Equipment Leaks – HON Subpart H, Continued

E. Control Devices for Equipment Leaks	<input checked="" type="checkbox"/> Not Applicable – No control devices handle equipment leaks from components subject to the provisions of Subpart H. <input type="checkbox"/> Applicable – Using closed-vent systems and control devices to comply with the provisions of Subpart H. See information below on applicable control devices and the parameters monitored to ensure that they are operated and maintained in conformance with their design.
---	--

Applicable?	Description	Control Device ID	Parameter Monitored
<input type="checkbox"/>	Recovery or Recapture Device (e.g. condensers and absorbers) designed and operated to recover the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with: <ul style="list-style-type: none"> • an efficiency of 95 percent or greater, or • to an exit concentration of 20 parts per million by volume, whichever is less stringent. <p style="text-align: right;">[§63.172(b)]</p>		
<input type="checkbox"/>	Enclosed combustion devices designed and operated to reduce the organic hazardous air pollutant emissions or volatile organic compounds emissions vented to them with: <ul style="list-style-type: none"> • an efficiency of 95 percent or greater, or • to an exit concentration of 20 parts per million by volume, on a dry basis, corrected to 3 percent oxygen, whichever is less stringent, or • to provide a minimum residence time of 0.50 seconds at a minimum temperature of 760 °C. <p style="text-align: right;">[§63.172(c)]</p>		
<input type="checkbox"/>	Flare in compliance with the requirements of §§63.11(b) of subpart A of this part. <p style="text-align: right;">[§63.172(d)]</p>		

F. Other Alternative Means of Emission Limitation (General) §63.177

- Not Applicable** – Not using any alternative means of emission limitation under §63.177.
- Applicable** – Permission was granted to use an alternative means of emission limitation under §63.177 and §63.6(g) of Subpart A.

Affected Equipment	Description of Alternative:

Section IX. Process Wastewater

Introduction

This section provides the results of any process wastewater applicability determinations.

A. Summary of Applicable Process Wastewater Streams

Complete the following table listing all applicable process wastewater streams.

Note: For new sources, include Table 8 – HON Subpart G compounds in a separate column.

Not Applicable

[§63.146(b)(1), (b)(2), 63.152(b)(1), Table 15 of Subpart G, §63.2520(d)(2)(i)]

(1) Wastewater Stream ID	(2) Description of Each Point of Determination (POD)	(3) Existing or New Affected Source?	(4) Designated as a Group 1 Stream? (Yes/No)	(5) Partially Soluble HAPs (PSHAP)	(6) Partially Soluble HAP (PSHAP) Annual Average Concentration (ppmw)	(7) What is the total annual load of PSHAP? (lb/yr)

(1) Wastewater Stream ID, contd.	(8) Soluble HAP (SHAP)	(9) Soluble HAP (SHAP) Annual Average Concentration (ppmw)	(10) What is the total annual load of SHAP? (lb/yr)	(11) Total PSHAP and SHAP Concentration (ppmw)	(12) Annual average flow rate (liter per minute)	(13) What is the total annual load of PSHAP and SHAP? (TPY)	(14) Group 1 or Group 2 Process Wastewater Stream	(15) For Group 2 streams, method for Determining PSHAP / SHAP Concentration and (Attachment # for supporting documentation)

Continued on next page

Section IX. Process Wastewater, Continued

B. Summary of Exempt Process Wastewater Streams

Complete the following table listing all exempt process wastewater streams.

Not Applicable

[§63.2520(d)(2)(i)]

(1) Wastewater Stream ID	(2) Description of Point of Determination / Evaluation	(3) Exemption Reason

Continued on next page

Section IX. Process Wastewater, Continued

C. Waste Management Unit Information

For Group 1 Process Wastewater Streams Only:

Not Applicable

Are any Group 1 wastewater streams transferred for treatment to an off-site treatment or on-site treatment not owned or operated by the source (Dow)?

Yes No

If yes, provide:

Name of the receiving party:	
Location:	
Does treatment facility meet the "Treatment in RCRA Unit Option" under §63.138(h)?	<input type="checkbox"/> Yes, the wastewater will be treated as hazardous waste at a facility that meets the requirements of §63.138(h) as an alternative to the off-site facility submitting the certification specified in §63.132(g)(2). <input type="checkbox"/> No, the treatment facility is not meeting the requirements in §63.138(h).

Indicate with an asterisk which streams below are transferred to an off-site treatment or on-site treatment not owned or operated by the source.

[§63.146(b)(2), (b)(7)(ii)(A), 63.152(b)(1)-(b)(2), Tables 13 and 15 of Subpart G, §63.2520(d)(2)(iii)]

(1) Wastewater Stream ID	(2) Treatment Process ID	(3) Waste Mgt. Unit Identification	(4) Description of Waste Mgt. Unit	(5) Intended Control Device / Technique	(6) Monitored Parameters for Control Device	(7) Proper Operating Range for Control Device	(8) Rationale for Chosen Operating Range for Control Device, Attachment #

Continued on next page

Section IX. Process Wastewater, Continued

E. Information on Residuals

For Group 1 Process Wastewater Streams Only:

Not Applicable

Are any residuals removed from Group 1 wastewater streams transferred for treatment to an off-site treatment or on-site treatment not owned or operated by the source (Dow)?

Yes No

If yes, provide:

Name of the receiving party:	
Location:	
Does treatment facility meet the "Treatment in RCRA Unit Option" under §63.138(h)?	<input type="checkbox"/> Yes, the wastewater will be treated as hazardous waste at a facility that meets the requirements of §63.138(h) as an alternative to the off-site facility submitting the certification specified in §63.132(g)(2). <input type="checkbox"/> No, the treatment facility is not meeting the requirements in §63.138(h).

Indicate with an asterisk which streams below are transferred to an off-site treatment or on-site treatment not owned or operated by the source.

[§63.146(b)(6), 63.152(b)(5), Table 19 of Subpart G, 63.2485(i)(1)]

(1) Residual ID Number ^(a)	(2) Residual description ^(b)	(3) Wastewater stream ID ^(c)	(4) Treatment process from which residual originates	(5) Fate ^(d)	(6) If Fate = D, Treatment Process Identification Used to Destroy Residual by 99% (Mark N/A if Fate does not = D)	(7) If Fate = D - Treatment Process Efficiency Attachment # ^(f)	(8) Waste Management Unit ID(s)	(9) Intended Emission Control Technique

Continued on next page

Section IX. Process Wastewater, Continued

Notes:

- (a) Name or identification code of residual removed from Group 1 wastewater stream.
- (b) Description of residual (e.g., steam stripper A-13 overhead condensates).
- (c) Identification of stream from which residual is removed.
- (d) Fate - Indicate whether the residual is:
 - A. Recycled to a production process
 - B. Sold for the purpose of recycling.
 - C. Returned to the treatment process.
 - D. Treated to destroy the total combined mass flow rate of Table 9 compounds by 99 percent or more.
 - E. In compliance with the requirements for the RCRA treatment option.
- (e) If the fate of the residual is such that the HAP mass is destroyed by 99 percent, give description of device used for HAP destruction. The types of treatment processes that are acceptable include nonbiological, noncombustion treatment processes and combustion treatment processes.
- (f) If the fate of the residual is such that the HAP mass is destroyed by 99 percent, provide an estimate of control device efficiency and attach substantiation in accordance with the instructions for this section.

Continued on next page

Section IX. Process Wastewater, Continued

F. Initial Compliance Demonstration Not Applicable

– Control Devices Controlling Vent Emissions from WMUs

[63.146(b)(7)(B)-(C), 63.152(b)(1), 63.139(d)(1) - (d)(2), 63.2520(d)(2)(ii), 63.7(g)]

Applicable? (Yes/No)	Waste Management Unit ID	Type of Control	Allowed Methodology to Demonstrate the Initial Compliance Verification	Attachment #(s) for Demonstration of Initial Compliance
		Group 1 Wastewater Streams - Vents from waste management units - Reduce the organic HAP emissions vented to the control device by 95 %wt or greater	Option 1 - Use performance test data.	See Attachment # _____ for the determination of compliance with the 95% reduction requirement.
			Option 2 - Prepare a design evaluation.	See Attachment # _____ for the design evaluation to show compliance with the 95% reduction requirement.
			The control device has been previously tested using the requirements specified in this rule.	No performance test is required. See Attachment # _____ for previous test report.
		Group 1 Wastewater Streams - Vents from waste management units - Achieve an outlet TOC concentration of 20 ppmv.	Demonstrate the 20 ppmv standard by doing a performance test.	See Attachment # _____ for the performance test for determining compliance with the 20 ppmv outlet TOC limit.
		Group 1 Wastewater Streams – Vents from waste management units – Reduce the vent emissions using a flare.	Comply with §63.11(b). Compliance determination should include visible emissions, net heating value and exit velocity. Include: <ul style="list-style-type: none"> the flare design (i.e. steam assisted, air assisted, or non-assisted) all visible emission readings, heat content determinations, flow rate measurements, and exit velocity determinations reports of times and durations of all periods during the compliance determination when the pilot flare is absent or the monitor is not operating 	See Attachment # _____ for the flare compliance demonstration.
		Group 1 Wastewater Streams - Wastewater Tanks receiving, managing, or treating an affected process wastewater stream or a residual from an affected process wastewater stream - Reduce emissions by using an internal floating roof tank.	Internal floating roof tank - do external visual inspection by compliance date.	See Attachment # _____ for results of external visual inspection.
		Group 1 Wastewater Streams - Wastewater Tanks receiving, managing, or treating an affected process wastewater stream or a residual from an affected process wastewater stream - Reduce emissions by using an external floating roof tank	External floating roof tank – do seal gap measurements by the compliance date.	See Attachment # _____ for seal gap measurements.

Continued on next page

Section IX. Process Wastewater, Continued

F. Initial Compliance Demonstration – Control Devices Controlling Vent Emissions from WMUs, continued

Not Applicable

Applicable? (Yes/No)	Waste Management Unit ID	Type of Control	Allowed Methodology to Demonstrate the Initial Compliance Verification	Attachment #(s) for Demonstration of Initial Compliance
		Halogenated vents streams – Use of a combustion device to comply with the wastewater vent stream provisions for a halogenated vent stream.	Demonstrate that the halogen reduction device reduces emissions by either of the amounts specified below: <ul style="list-style-type: none"> A halogen reduction device after the combustion control device must reduce overall emissions of hydrogen halides and halogens by 95 percent or to a concentration < 20 ppmv. A halogen reduction device located before the combustion control device must reduce the halogen atom content of the vent stream to a concentration < 20 ppmv. 	See Attachment # _____ for performance test to demonstrate compliance with the halogenated vent stream provisions.
		Boiler or process heater with a design heat input capacity of 44 MW or greater	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater into which the emission stream is introduced with the primary fuel	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater burning hazardous waste for which the owner or operator has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 266, subpart H.	Exempt from initial compliance demonstration.	Not applicable
		Boiler or process heater burning hazardous waste for which the owner or operator has certified compliance with the interim status requirements of 40 CFR part 266, subpart H	Exempt from initial compliance demonstration.	Not applicable
		Hazardous waste incinerator for which the owner or operator has been issued a final permit under 40 CFR part 270 and complies with the requirements of 40 CFR part 264, Subpart O.	Exempt from initial compliance demonstration.	Not applicable
		Hazardous waste incinerator for which the owner or operator has certified compliance with the interim status requirements of 40 CFR part 265, Subpart O	Exempt from initial compliance demonstration.	Not applicable

Continued on next page

Section IX. Process Wastewater, Continued

G. Fixed Roofs, Covers and Enclosures

For each fixed roof, cover, and enclosure on wastewater tanks, surface impoundments, containers, individual drain systems, and oil-water / organic-water separators, provide the initial monitoring results: (Check one)

[63.2525(d)(2)(ii), 63.148(b)(3), 63.152(b)(1)]

<input checked="" type="checkbox"/> Not Applicable	No process wastewater streams or only Group 2 process wastewater streams.
<input type="checkbox"/> Not Applicable	No fixed roofs, covers or enclosures on wastewater tanks, surface impoundments, containers, individual drain systems, and oil-water separators
<input type="checkbox"/> Not Applicable	All fixed roofs and enclosures are operated under negative pressure.
<input type="checkbox"/> Applicable	No leaks detected during initial inspection – date of inspection: {Enter Date}
<input type="checkbox"/> Applicable	Leak detected during initial inspection – date of inspection: {Enter Date}. Required information is provided below.

Complete the following table ONLY if leaks were detected during monitoring / inspection:

(1) Waste Management Unit I.D.	(2) Fixed Roof, Cover or Enclosure Inspection?	(3) Date Visual Leak Detected	(4) Date of First Attempt at Repair	(5) Date Leak Was Repaired OR "Delay of Repair" if Necessary

Complete the following table for components on Delay of Repair:

(6) Reason for Delay of Repair Code	(7) Name of Person who Made Delay of Repair Decision	(8) Expected Date of Repair (if not Already Repaired)	(9) Date(s) of shutdowns that occurred while the component was unrepaired	(10) Date of Successful Repair of the Leak
Reason for Delay of Repair Codes: A. Repair is technically infeasible without a shutdown or B. Emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair.				

Section X. Maintenance Wastewater

Introduction

This section provides the results of any maintenance wastewater applicability determinations.

A. Summary of Applicable Maintenance Wastewater Streams

Check appropriate box for each MCPU.

- Maintenance wastewater plan applies and is implemented per 63.2485(b), 63.105
 Not applicable for this MCPU; no maintenance wastewater streams.

B. Summary of Exempt Maintenance Wastewater Streams

Complete the following table listing all exempt maintenance wastewater streams.

- Not Applicable

(1) Wastewater Stream ID or Activity	(2) Exemption Reason

Section XI. Liquid Streams in Open Systems

Introduction

This section provides the results of any storage tank applicability determinations.

A. Summary of Equipment Handling Liquid Streams in Open Systems

Complete the following table listing all equipment subject to the provisions in §§63.2485(l) for liquids streams in open systems.

Note: For new sources, include Table 8 – HON Subpart G compounds in a separate column.

Not Applicable

(1) Equipment ID	(2) Equipment Type	(3) Partially Soluble HAPs (PSHAP)	(4) Partially Soluble HAP (PSHAP) Annual Average Concentration (ppmw)	(5) What is the total annual load of PSHAP? (lb/yr)	(6) Soluble HAP (SHAP)	(7) Soluble HAP (SHAP) Annual Average Concentration (ppmw)	(8) What is the total annual load of SHAP? (lb/yr)	(9) Total PSHAP and SHAP Concentration (ppmw)

Continuation of table above:

(1) Equipment ID, contd.	(10) Annual average flow rate (liter per minute)	(11) What is the total annual load of PSHAP and SHAP? (TPY)	(12) Control Required?	(13) Control Method Code	(14) Control Device ID	(15) If using a control device, which standard does the control device meet?

Continued on next page

Section XI. Liquid Streams in Open Systems, Continued

**B. Summary of
Equipment Exempt
from the
Requirements for
Liquid Stream in
Open Systems**

Complete the following table listing all equipment exempt from the provisions for liquid streams in open systems.

Not Applicable

(1) Equipment ID	(2) Exemption Reason

Section XII. Heat Exchange Systems

Introduction

This section provides the results of any heat exchange system applicability determinations.

A. Summary of Applicable Heat Exchange Systems

Complete the following table listing all heat exchange systems subject to monitoring.

Not Applicable

(1) Heat Exchange System ID	(2) Heat Exchanger Type	(3) Monitoring Option Selected	(4) What will be monitored?

For batch operations, include the following (delete if not a batch operation)

- Note: XXXX MCPU is a process that is not operational throughout the year. Therefore, the heat exchange system will be monitored monthly during periods of operation during the initial six month period from May 2008 -October 2008. As allowed by § 63.2490 and § 63.104 (b)(1), and (c)(1)(iii) after initial six months, monitoring will be conducted quarterly if the process is operational for any period during that quarter. During calendar months or quarters of non-operation, no monitoring will be conducted.

B. Summary of Exempt Heat Exchange Systems

Complete the following table listing all exempt heat exchange systems.

Not Applicable

(1) Heat Exchange System ID	(2) Which exemption is being used?	(3) List any supporting details for exemption documentation

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process

A. General Information

The purpose of this section is to include all information required to be reported by Subpart SS (§63.999(b)) for closed vent systems, control device, recovery devices and routing emissions to a fuel as system or a process.

Not Applicable –Subpart SS is not applicable to this MCPU because either no emission points subject to control and/or no emission points are routed to a control device, a fuel gas system or a process.

Applicable – This MCPU uses a shared control device(s). See the NOCS for [Enter control device name(s)] for the information required to be reported by Subpart SS. MCPUs which do not operate a control device should leave Section XIII of the report blank.

Applicable – Complete all of Section XIII that is applicable if you are the operator of the control device.

A.1. Definition of Operating Day

The source's operating day for purposes of determining daily average values of monitored parameters is defined as follows: (Note: The operating day may be from midnight to midnight or another daily period).

Not Applicable – This section is not applicable because records of daily averages are not required.

[§63.998(b)(3)(i)(B), §63.999(b)(3)(iii)]

Operating Day Begin Time:	
Operating Day End Time:	

A.2. Alternative Recordkeeping

The alternative recordkeeping requirements of §§63.998(b)(5) are being implemented.

Applicable – Only the daily average value will be retained and not the more frequently monitored operating parameter values for a monitored parameter. The requirements specified in §63.998(b)(5)(i)(A) through (F) are met.

Not Applicable

[§63.998(b)(5), 999(b)(5)]

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

B. Routing Emissions to a Process or Fuel Gas System

This section applies if electing to comply with the requirements for storage vessels, low throughput transfer racks, or equipment leaks by routing emissions to a process or to a fuel gas system.

B.1. Storage Tank and Transfer Rack Emissions Routed to a Process

- Not Applicable** – Emission streams from storage vessels or transfer racks are not routed to a process.
- Applicable** - Storage vessel and/or transfer rack emissions are routed to a process. For storage vessels only, see the attachment number(s) below for the design evaluation or engineering assessment demonstrating the extent to which regulated material emissions are:
- Recycled and/or consumed in the same manner as a material that fulfills the same function in that process;
 - Transformed by chemical reaction into materials that are not regulated materials;
 - Incorporated into a product; and/or
 - Recovered.

[§63.999(b)(1)(i), (iii) → §63.984(b)(2), (b)(3)]

ID of Storage Tank or Transfer Rack Routed to a Process	For Storage Tanks, which Condition Is Met ^a	Attachment # for Design Evaluation or Engineering Assessment

- (a) Codes for Routing Emissions to a process - Regulated material in the emissions are:
- (1) Recycled and/or consumed in the same manner as a material that fulfills the same function in that process;
 - (2) Transformed by chemical reaction into materials that are not regulated materials;
 - (3) Incorporated into a product; and/or
 - (4) Recovered.

B.2. Storage vessel and Transfer Rack Emissions are routed to a fuel gas system

- Not Applicable** - Emission streams from storage vessels or transfer racks are not routed to a fuel gas system.
- Applicable** – Emission streams from the following storage tanks and transfer racks are connected to a fuel gas system. The conveyance system(s) is/are subject to the closed vent system requirements in §63.983.
- {Storage Tank / Transfer Rack ID}
 - {Storage Tank / Transfer Rack ID}
 - {Storage Tank / Transfer Rack ID}

[§63.999(b)(1)(ii) → §63.984(c)]

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

C. Routing Emissions from Storage Tank and Low Throughput Transfer Racks to a NonFlare Control Device and / or Halogen Reduction Device

This section applies if routing storage vessel or low throughput transfer rack emissions to a nonflare control device and/or halogen reduction device.

Not Applicable

[§63.985(a), (b), (c), §63.999(b)(2)(i)-(vi), §63.2520(d)(2)(ii)-(iii), 63.7(g)]

(1) Storage Tank or Low Throughput Transfer Rack ID	(2) Emission Point Type - Storage Tank (ST) or Transfer Rack (TR-L)	(3) Control Device or Halogen Reduction Device ID	(4) Type of Control Device or Halogen Reduction Device	(5) Parameter(s) To Be Monitored for Control Device	(6) Monitoring Plan (Attachment #) – including monitoring frequency ^(a)	(7) Monitoring Parameter Operating Limit	(8) Design Evaluation (DE) or Performance Test (PT) – (Attachment #) ^(b)	(9) If performance test is conducted – Attachment # for Continuous Monitoring Data Measured During Performance Test

- (a) For storage tanks, the monitoring plan requirements do not apply for the purposes of MON. You must establish operating limits, conduct monitoring and keep records using the same procedures as required in Subpart SS for control devices used to control emissions from process vents.
- (b) If a performance test is conducted, include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §§63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,

Continued

D. Routing Emissions from Process Vent and Transfer Racks (Excluding Low Throughput) to a Nonflare Control Device and/or Halogen Reduction Device

This section applies if routing process vent or transfer rack (excluding low throughput transfer racks) emissions to a nonflare control device and/or halogen reduction device.

Not Applicable

[§63.988(b), §63.990(b), §63.994(b), §63.995(b), §63.996(c)(6), §63.999(a)(2)(iii)(B) → §63.998(a)(2)(ii), §63.999(b)(3)(i)-(ii), §63.999(b)(4) → §63.998(a)(4), §63.2520(d)(2)(ii)-(iii), 63.7(g)]

(1) Process Vent or Transfer Rack ID	(2) Emission Point Type Process Vent (PV) or Transfer Rack (TR-H)	(3) Control Device or Halogen Reduction Device ID	(4) Type of Control Device or Halogen Reduction Device	(5) Parameter(s) To Be Monitored for Control Device	(6) Monitoring Parameter Operating Limit	(7) Rationale for the Parameter Limit (Attachment #) ^(a)	(8) Halogen concentration in vent stream ^(b)	(9) Design Evaluation (DE) for Small Control Devices or Performance Test (PT) for Large Control Devices – (Attachment #) ^(c)	(10) Continuous Monitoring Data Measured During Performance Test (Attachment #)

^(a) Attach the rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control device.

^(b) Halogen concentration is not required if the vent stream is designated as halogenated. Indicate that the stream is designated as halogenated, if applicable.

^(c) Include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process, Continued

E. Routing Emissions to a Flare

This section applies if routing emissions to a flare.

Not Applicable – flare not required to meet rule provisions.

[§63.987(b), §63.999(a)(1)(ii), (a)(2), (a)(2)(iii)(A) → §63.998(a)(1)(i), §63.2520(d)(2)(ii), 63.7(g)]

(1) Emission Source ID	(2) Emission Source Type -Storage Tank (SV), Transfer Rack (TR), Process Vent (PV) ^(d)	(3) Flare ID	(4) Flare design ^(a)	(5) Flare Compliance Assessment Report (Attachment #) ^{(b), (c)}

(a) Flare design – i.e. steam-assisted, air-assisted, or non-assisted.

(b) Include one complete test report for each test method used for a particular kind of emission point. For additional tests performed for the same kind of emission point using the same method, the results and any other information required in applicable sections of Subpart SS shall be submitted, but a complete test report is not required. If approval has been granted to use a prior performance test or compliance assessment per §§63.997(b)(1), then attach the approval letter granting permission to substitute the prior performance test or compliance assessment in lieu of the test report.

(c) For flare compliance assessments, include all visible emission readings, heat content determinations, flow rate measurements, and exit velocity determinations. Also include all periods during the flare compliance assessment when all pilot flames are absent or, if only the flare flame is monitored, all periods when the flare flame is absent.

(d) Refer to Section VIII.E. (HON Subpart H) or Section VIII.D. (Subpart UU) for equipment leak components routed to a closed vent system and flare.

Continued on next page

Section XIII: 40 CFR 63 Subpart SS - National Emission Standards for Closed Vent Systems, Control Devices, Recovery Devices and Routing to a Fuel Gas System or a Process,
 Continued

F. Recovery Devices for Maintaining TRE above a Specified Level

This section applies to process vent emissions that are routed to a final recovery device to maintain a TRE above a level specified in a referencing subpart.

Not Applicable

[§63.993(b), §63.999(a)(2)(iii)(C) → §63.998(a)(3), §63.999(b)(3)(i)-(ii)]

(1) Process Vent ID	(2) Recovery Device ID	(3) Type of Recovery Device ^(a)	(4) Parameter(s) To Be Monitored for Recovery Device	(5) Monitoring Parameter Operating Limit	(6) Rationale for the Parameter Limit(Attachment #) ^(b)	(7) TRE Index Value Determination (Attachment #)	(8) Continuous Monitoring Data Measured During TRE Determination (Attachment #)

^(a) See Method of Control Codes in Appendix A

^(b) Attach the rationale for the specific range for each parameter for each emission point, including any data and calculations used to develop the range and a description of why the range indicates proper operation of the control device.

Section XIV. Continuous Emissions Monitoring Systems (CEMS)

A. CEMS Performance Evaluation

Each continuous emissions monitoring system (CEMS) must be installed, operated, and maintained according to the requirements in §63.8 and §63.2450(j)(1)-(j)(5).

Not Applicable

Applicable

If applicable, list the Attachment number for the results of the performance evaluations of each CEMS conducted according to the requirements in §63.8 and according to the applicable Performance Specification of 40 CFR Part 60, appendix B.

Attachment # for CEMS Performance Evaluation:	
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[§§63.2450(j)(3), §63.8]

B. Alternative Standard

To demonstrate compliance with the alternative standard for continuous process vents, batch process vents, hydrogen halides / halogen HAPs, or storage tanks, submit the results of any determination of target analytes of predominant HAP.

Not Applicable

Applicable – Complying with alternative standard (§§63.2505). Results of determination of target analytes are included below:

[§63.2505(b)(5)]

**Attachment OMU3-01
 Process Operating Scenario**

Description of the Process / Type of Equipment Used Process ingredients are received in containers. Solvent #3 (a hazardous air pollutant containing material) is pumped from containers to Solvent Tank K18. (Group 2 Batch Process Vent)

Solvent #3 is transferred to the Reactor J01 where other process ingredients are added. (Group 2 Batch Process Vent)

Products and waste materials are discharged to containers for shipping and management.

Identification of Each Process Vent and its associated Emissions Episodes and Durations As reported in the MON Notification of Compliance Status, Section IX.A there are no Group 1 or Group 2 process vents for this MCPU.

Identification of wastewater Point of Determinations (PODs) As reported in the MON Notification of Compliance Status, Section IX.A there are no process wastewater streams for this MCPU.

Identification of storage tanks As reported in the MON Notification of Compliance Status, Section VI.A. there are no storage tanks.

Identification of transfer racks As reported in the MON Notification of Compliance Status, Section VII.A. there are no transfer racks for this MCPU.

Applicable Control Requirements / Level of Required Control Not applicable.

Control or treatment devices used

Not Applicable

Control Device ID	Control Device Type

For Group 1 process wastewater streams only:

Not Applicable

Treatment Device ID	Treatment Device Type

Description of operating and/or testing conditions for any associated control device Not applicable

Process vents, wastewater PODs, transfer racks and storage tanks (including those from other processes) Simultaneously routed to the Control or Treatment Device(s)

Not applicable

Applicable monitoring requirements / Parametric Levels

Not applicable

Calculations and engineering analyses required to demonstrate compliance

On file

CERTIFIED MAIL-RETURN RECEIPT REQUESTED
7012 2920 0000 2036 5076

May 4, 2016

Mr. William F. Durham, Director
WV DEP-Division of Air Quality
601 57th Street S.E.
Charleston, West Virginia 25304

Dear Mr. Durham,

Attention: Carrie McCumbers
Title V Permits Manager

RE: Univation Technologies, LLC (UT)
South Charleston Catalyst Plant (SCCP)
Plant ID: 039-00618
Regulation 30 Certified Emissions Registration Form

Attached is an updated Certified Emissions Registration Form. The revised Form covers emissions for the UT SCCC operations. The revised potential to emit emission estimates are the result of minor changes in the OMU2 operating process. Hazardous air pollutant emissions for the OMU3 process are incorporated.

If you have any questions, please contact Freddie Sizemore by at (304) 747-3713 or me at (304) 747-3131 (or by email: bgreenfield@univation.com).

Sincerely yours,



William E. Greenfield
Production Leader

cc: Ms. Zelma Maldonado, Associate Director (cover letter only)
Office of Air Enforcement and Compliance (3AP20)
U. S. Environmental Protection Agency, Region III
1650 Arch Street
Philadelphia, PA 19103-2029

CERTIFIED MAIL-RETURN RECEIPT REQUESTED
7012 2920 0000 2036 5090

Attachment J - UT CES-RegistrationForm_2016
WEST VIRGINIA DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF AIR QUALITY

601 57th Street, SE, Charleston, WV 25304 Phone: (304)926-0475 Fax: (304)926-0479

CERTIFIED EMISSIONS STATEMENT (CES) REGISTRATION FORM

45 CSR 30 (CAAA Title V)

TYPE OR PRINT IN INK ONLY, DO NOT USE PENCIL

Date: May 3, 2016

Organization/Facility Information:

Is this a Revision? Yes No

Name of Organization: Univation Technologies LLC

Type of Facility: Miscellaneous Organic Chemical Manufacturing

Name or ID of Facility: Univation Technologies South Charleston Catalyst Plant

Location or Nearest Town: WV Regional Technology Park

Address: P. O. Box 8361 (Building 300) South Charleston WV 25303
(Street or P.O. Box) City State Zip Code

SIC Code: 2869

Contact Name: William E. Greenfield

Telephone #: (304) 776-7913

DAQ ID No:*

*Agency Use Only

Section A: Title V Applicability Determination

The stationary source for which this worksheet is filed:

1. Has the potential to emit (PTE) 10 TPY or more of one (1) hazardous air pollutant (HAP) or 25 TPY or more for any combination of HAPs listed in Table 45-30A of 45CSR30.

YES NO

2. Has the PTE 100 TPY or more of any (1) one air pollutant listed on Table 2 of Section B and Table 45-30B of 45CSR30.

YES NO

3. Is subject to an emission standard(s) promulgated under Section 111 of the Clean Air Act (40 CFR Part 60).

YES NO

4. Is subject to an emission standard(s) promulgated under Section 112 of the Clean Air Act (including 40 CFR Part 61 and 40 CFR Part 63).

YES NO

5. Is an affected source under the Acid Rain Program of Title IV of the 1990 Clean Air Act Amendments.

YES NO

Section B: PTE Determination Continued

Table 2: Report **Potential Emissions** of all the Following Air Pollutants.

POLLUTANT	POINT (TPY)	FUGITIVE (TPY)	SECONDARY (TPY)	TOTAL (TPY)
PM	0.89			1
PM ₁₀	0.89			1
NO _x	1.68			2
SO ₂	<0.1			<0.1
CO	4.15			4.2
VOC	4.3	1		5.3
O ₃				
Lead				
Fluorides				
Sulfuric Acid Mist				
Hydrogen Sulfide				
Total Reduced Sulfur Compounds				
Reduced Sulfur Compounds				
Report Below of PTE Class I and Class II Substances (List Each One) See Attachment B				
HCFC-22	No emissions during normal operation			

EMISSION STATEMENT CERTIFICATION

I, the undersigned, hereby certify, that I am a responsible official, as defined in 45 CSR 30, that I have examined and that I am personally familiar with the information reported in my company's emission statement, including the Title V applicability determination contained therein.

Such examination has shown that my company: (check)

- is not subject to the title V permit program,
- is subject to the Title V program and is required to submit an application for a Title V operating permit according to the schedule outlined in 45 CSR 30 and pay Title V fees based on actual emissions from the most recent calendar year.

Based on my inquiry of those individuals with primary responsibility for obtaining all information including emission data, I certify that the information is to my 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:

William E Greenfield
Authorized Signature

5/3/15
Date

William E. Greenfield
Typed or printed name of Signatory

Production Leader
Title of Signatory