West Virginia Department of Environmental Protection
Joe Manchin, III
Governor
Division of Air Quality
Randy C. Huffman
Cabinet Secretary

Class II Administrative Update

R13- 1823J

This permit is issued in accordance with the West Virginia Air Pollution Control Act (West Virginia Code §§22-5-1 et seq.) and 45 C.S.R. 13 – Permits for Construction, Modification, Relocation and Operation of Stationary Sources of Air Pollutants, Notification Requirements, Temporary Permits, General Permits and Procedures for Evaluation. The permittee identified at the above-referenced facility is authorized to construct the stationary sources of air pollutants identified herein in accordance with all terms and conditions of this permit.

Issued to:

The Chemours Company FC, LLC
Washington Works
107-00182

William F. Durham
Director

Issued: March 4, 2015

This permit will supercede and replace Permit R13-1823I.

Facility Location:	Parkersburg, Wood County, West Virginia
Mailing Address:	P.O. Box 1217, Washington, WV 26181
Facility Description:	Fluoropolymer Production Facility
SIC Codes:	2821
UTM Coordinates:	442.3767 km Easting • 4346.8331 km Northing • Zone 17
Permit Type:	Class II Administrative Update
Description of Change:	Addition of two hydrochloric acid storage tanks (T2ET and T2EU) at the Monomer production unit. These units are subject to 40 CFR Subpart NNNNN (HCl MACT) which includes requirements for equipment leaks under 40CFR Subpart H. The control device for these tanks will be the already existing packed bed scrubber T2ERC. There will be an total increase of HCl emissions of 5.0 lbs/year. Change of facility ID from 107-00001 to 107-00182, change of Permittee Name from "E. I. du Pont de Nemours & Co." to "The Chemours Company" and Facility Name from "DuPont Washington Works" to "Washington Works." Changed name in Attachment A, B, and C from "DuPont Washington Works" to "Washington Works".

Any person whose interest may be affected, including, but not necessarily limited to, the applicant and any person who participated in the public comment process, by a permit issued, modified or denied by the Secretary may appeal such action of the Secretary to the Air Quality Board pursuant to article one [§§22B-1-1 et seq.], Chapter 22B of the Code of West Virginia. West Virginia Code §§22-5-14.

The source is subject to 45CSR30. The permittee has the duty to update the facility's Title V (45CSR30) permit application to reflect the changes permitted herein.

Table of Contents

1.0. Emission Units 4

2.0. General Conditions 7
2.1. Definitions 7
2.2. Acronyms 7
2.3. Authority 8
2.4. Term and Renewal 8
2.5. Duty to Comply 8
2.6. Duty to Provide Information 8
2.7. Duty to Supplement and Correct Information 9
2.8. Administrative Permit Update 9
2.9. Permit Modification 9
2.10 Major Permit Modification 9
2.11. Inspection and Entry 9
2.12. Emergency 9
2.13. Need to Halt or Reduce Activity Not a Defense 10
2.14. Suspension of Activities 10
2.15. Property Rights 10
2.16. Severability 11
2.17. Transferability 11
2.18. Notification Requirements 11
2.19. Credible Evidence 11

3.0. Facility-Wide Requirements 12
3.1. Limitations and Standards 12
3.2. Monitoring Requirements 12
3.3. Testing Requirements 12
3.4. Recordkeeping Requirements 13
3.5. Reporting Requirements 14

4.0. Source-Specific Requirements 15
4.1. Limitations and Standards 15
4.2. Monitoring Requirements 23
4.3. Testing Requirements 26
4.4. Recordkeeping Requirements 27
4.5. Reporting Requirements 31

Attachment A – Recordkeeping for Process Emissions 34
Attachment B – Recordkeeping for Maintenance Emissions 35
Attachment C – Recordkeeping for Control Devices 36
Attachment D – Monthly Process Emissions 37
Attachment E – Annual Emissions 38
Attachment F – Furnace Log 41
Attachment G – Malfunction Log 42
Attachment H – Odor Log 43
CERTFICATION OF DATA ACCURACY 44

1.0. Emission Units

Emission Unit ID	Emission Point ID	Emission Unit Description	Control Device
C1FQ	T7IME	Autoclave (R13-2365)	T7IMC
C1GH	T7IME	Monomer Feed System (R13-2365)	T7IMC
C2EG	T7IME	Polykettle/Coagulator Vent (R13-1953)	T7IMC
C2ES	T7IME	Reactor Vent (R13-1953)	T7IMC
C3IZ	T7IME	C3 Area Accumulator (R13-2391)	T7IMC
T1BB	T7XIE	Compressor & Intercooler	n/a
T1BC	T7XIE	Compressor & Intercooler	n/a
T1BD	T7XIE	Compressor & Intercooler	n/a
T1BE-J	T7XIE	Coolers	T7XIC
T1BK,L,M	T7XIE	Bag Filters	n/a
T1BN	T7XIE	Bag Filter	n/a
T1BP-T	T7XIE	Storage Tanks	T7XIC
T1BW, BX&XC-C	T7IME	Absorber	T7IMC
T1CA	T1CAE/T7XIE	Furnace	n/a
T1CB	T1CBE/T7XIE	Furnace	n/a
T1CC	T1CCE/T7XIE	Furnace	n/a
T1CD	T1CDE/T7XIE	Furnace	n/a
T1CK,LA&CL	T7XIE	Aftercoolers	n/a
T1CU	T7XIE	Tank	n/a
T1CV	T7IME	Dryer	T7IMC
T1CW	T7XIE	Tank	n/a
T1DB&C	T7XIE	Dryers	n/a
T1DD-F	T7XIE/T7IME	Cooler	T7XIC/T7IMC
T1DG&H	T7XIE/T7IME	Bag Filter	T7XIC/T7IMC
T1DI	T7IME/T7XIE	Vaporizer	T7IMC
T1DS	T7XIE	Scrubber Tank & Compr Inlet Piping	T7XIC
T1DT	T7XIE	Spare Intercooler	n/a
T1DU	T7IME/ T7XIE	Compress Area Common Hi-Press Piping	T7IMC
T1EE	T7XIE	Analyzer Vents	n/a
T1EV	T7XIE	Shipping Trailers	n/a
T1GN	T1GNE/T7XIE	Mixed Gas Holder	n/a
T1JB	T1JBE	Raw Material Unloading	n/a
T1LB,C,D&E	T7XIE	Raw Material Storage	n/a
T1LF	T2ERE/T7XIE	Storage Tank & Vaporizer	T2ERC/T7XIC

Emission Unit ID	Emission Point ID	Emission Unit Description	Control Device
T1LH	T1LHE	Feed Pump	n/a
T1LI	T1LIE	Feed Pump	n/a
T1XA	T7IME/T1XAE	Compressor & Intercooler	T7IMC
T1XB	T7XIE	Bag Filter	n/a
T1XD	T7IME/T7XIE	Column	T7IMC/T7XIC
T1XG	T7IME/T7XIE	Column	T7IMC
T1XO	T7IME/T7XIE	Column - Feed Condenser	T7IMC
T2EN	T2ERE	Tank Car Loading	T2ERC
T2EO&P	T2ERE	Tanks	T2ERC
T2ER	T2ERE	Storage Tanks	T2ERC
T2ET	T2ERE	HCl Aqueous Acid Tank #1	T2ERC
T2EU	T2ERE	HCl Aqueous Acid Tank #2	T2ERC
T2ES	T2ERE	Air Stripper	T2ERC
T2EX	T7IME	Trailer Loading	T7IMC
T2EY	T2EYE	Analyzer Vent	n/a
T2XH&T2XL	T7IME/ T2ERE	Cooler/Absorber Vent	T7IMC/T2ERC
T2XJ	T7IME/T7XIE	Column	T7IMC
T2XM	T7IME/T7XIE	Column	T7IMC
T2XN	T7IME/T7XIE	Column	T7IMC
T2XQ	T7XIE	Vaporizer	T7XIC
T2XS	T7XIE	Column Feed Cooler	n/a
T2XT,T2XU	T2ERE	Absorption Beds	T2ERC
T2XV	T7XIE	Cooler Loop	n/a
T3FB	T7XIE	Furnace	n/a
T4GA	T4GAE/T7XIE	Detox System	n/a
T4GB	T4GBE	Storage Tank	n/a
T4GC	T4GCE	Storage Tank	n/a
T4GK	T7XIE	Shipping Containers	n/a
T4GM	T7IME/ T7XIE	Column	T7IMC
T4GO	T7XIE	Storage Tank	n/a
T4GP	T7XIE	Feed Tank	n/a
T4GQ	T7XIE	Recycle Tank	n/a
T4GS	T7XIE	Column	n/a
T4GT	T7XIE	Column	n/a
T4GU, T4GV	T7XIE	Storage Tanks	n/a
T4GW	T7XIE	Tank	n/a
T4GX	T7XIE	Tank	n/a

Emission Unit ID	Emission Point ID	Emission Unit Description	Control Device
T4KA	T7XIE	Cylinder Loading	n/a
T4KB	T7XIE	Feed Tank	n/a
T4KC	T7XIE	Truck Loading	n/a
T4KD	T7XIE	Tank Car Loading	n/a
T4XK	T7IME/ T7XIE	Column	T7IMC
T6ID & T6IU	T7IME	Autoclaves (R13-815)	T7IMC
T7AA	T7XIE	Cold Brine Tank	n/a
T7AK	T7CVE	Cooling Tower	n/a
T7EI,T7XI	T7XIE	N & S Stillhouse Vacuum Systems (Misc. Vents)	n/a
T7EM	T7IME	Portable Container Facility	T7IMC
T7IO	T7IOE	Silo	T7IOC
T7JD	T7JDE	Neutralization Tank	T7JDC
T7JJ	T7JJE	Emergency Generator	n/a
T7JK	T7JKE	Trailer Loading	n/a
T7JO	T7JOE	Sulfite Tank - EXEMPT: Non-volatile Aqueous Salt	n/a
T7JP	T7JPE	Sulfite Tank - EXEMPT: Non-volatile Aqueous Salt	n/a

2.0. General Conditions

2.1. Definitions

2.1.1. All references to the "West Virginia Air Pollution Control Act" or the "Air Pollution Control Act" mean those provisions contained in W.Va. Code §§ 22-5-1 to 22-5-18.

2.1.2. The "Clean Air Act" means those provisions contained in 42 U.S.C. §§ 7401 to 7671q, and regulations promulgated thereunder.

2.1.3. "Secretary" means the Secretary of the Department of Environmental Protection or such other person to whom the Secretary has delegated authority or duties pursuant to W.Va. Code §§ 22-1-6 or 22-1-8 (45CSR§30-2.12.). The Director of the Division of Air Quality is the Secretary's designated representative for the purposes of this permit.

2.2. Acronyms

CAAA	Clean Air Act Amendments	**NO_X**	Nitrogen Oxides
CBI	Confidential Business Information	**NSPS**	New Source Performance Standards
CEM	Continuous Emission Monitor	**PM**	Particulate Matter
CES	Certified Emission Statement	**$PM_{2.5}$**	Particulate Matter less than 2.5 μm in diameter
C.F.R. *or* CFR	Code of Federal Regulations	**PM_{10}**	Particulate Matter less than 10μm in diameter
CO	Carbon Monoxide	**Ppb**	Pounds per Batch
C.S.R. *or* CSR	Codes of State Rules	**Pph**	Pounds per Hour
DAQ	Division of Air Quality	**Ppm**	Parts per Million
DEP	Department of Environmental Protection	**Ppm_V or ppmv**	Parts per Million by Volume
dscm	Dry Standard Cubic Meter	**PSD**	Prevention of Significant Deterioration
FOIA	Freedom of Information Act	**Psi**	Pounds per Square Inch
HAP	Hazardous Air Pollutant	**SIC**	Standard Industrial Classification
HON	Hazardous Organic NESHAP	**SIP**	State Implementation Plan
HP	Horsepower	**SO_2**	Sulfur Dioxide
lbs/hr	Pounds per Hour	**TAP**	Toxic Air Pollutant
LDAR	Leak Detection and Repair	**TPY**	Tons per Year
M	Thousand	**TRS**	Total Reduced Sulfur
MACT	Maximum Achievable Control Technology	**TSP**	Total Suspended Particulate
MDHI	Maximum Design Heat Input	**USEPA**	United States Environmental Protection Agency
MM	Million	**UTM**	Universal Transverse Mercator
MMBtu/hr *or* mmbtu/hr	Million British Thermal Units per Hour	**VEE**	Visual Emissions Evaluation
MMCF/hr *or* mmcf/hr	Million Cubic Feet per Hour	**VOC**	Volatile Organic Compounds
NA	Not Applicable	**VOL**	Volatile Organic Liquids
NAAQS	National Ambient Air Quality Standards		
NESHAPS	National Emissions Standards for Hazardous Air Pollutants		

2.3. Authority

This permit is issued in accordance with West Virginia air pollution control law W.Va. Code §§ 22-5-1. et seq. and the following Legislative Rules promulgated thereunder:

2.3.1. 45CSR13 – *Permits for Construction, Modification, Relocation and Operation of Stationary Sources of Air Pollutants, Notification Requirements, Temporary Permits, General Permits and Procedures for Evaluation*;

2.4. Term and Renewal

2.4.1. This permit supersedes and replaces previously issued Permit R13-1823H. This Permit shall remain valid, continuous and in effect unless it is revised, suspended, revoked or otherwise changed under an applicable provision of 45CSR13 or any other applicable legislative rule;

2.5. Duty to Comply

2.5.1. The permitted facility shall be constructed and operated in accordance with the plans and specifications filed in Permit Application R13-1823, R13-1823A, R13-1823B, R13-1823C, R13-1823D, R13-1823E, R13-1823F, R13-1823G, R13-1823H, R13-1823I, and any modifications, administrative updates, or amendments thereto. The Secretary may suspend or revoke a permit if the plans and specifications upon which the approval was based are not adhered to; **[45CSR§§13-5.11 and -10.3.]**

2.5.2. The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the West Virginia Code and the Clean Air Act and is grounds for enforcement action by the Secretary or USEPA;

2.5.3. Violations of any of the conditions contained in this permit, or incorporated herein by reference, may subject the permittee to civil and/or criminal penalties for each violation and further action or remedies as provided by West Virginia Code 22-5-6 and 22-5-7;

2.5.4. Approval of this permit does not relieve the permittee herein of the responsibility to apply for and obtain all other permits, licenses, and/or approvals from other agencies; i.e., local, state, and federal, which may have jurisdiction over the construction and/or operation of the source(s) and/or facility herein permitted.

2.6. Duty to Provide Information

The permittee shall furnish to the Secretary within a reasonable time any information the Secretary may request in writing to determine whether cause exists for administratively updating, modifying, revoking, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the Secretary copies of records to be kept by the permittee. For information claimed to be confidential, the permittee shall furnish such records to the Secretary along with a claim of confidentiality in accordance with 45CSR31. If confidential information is to be sent to USEPA, the permittee shall directly provide such information to USEPA along with a claim of confidentiality in accordance with 40 C.F.R. Part 2.

2.7. Duty to Supplement and Correct Information

Upon becoming aware of a failure to submit any relevant facts or a submittal of incorrect information in any permit application, the permittee shall promptly submit to the Secretary such supplemental facts or corrected information.

2.8. Administrative Update

The permittee may request an administrative update to this permit as defined in and according to the procedures specified in 45CSR13.
[45CSR§13-4.]

2.9. Permit Modification

The permittee may request a minor modification to this permit as defined in and according to the procedures specified in 45CSR13.
[45CSR§13-5.4.]

2.10 Major Permit Modification

The permittee may request a major modification as defined in and according to the procedures specified in 45CSR14 or 45CSR19, as appropriate.
[45CSR§13-5.1]

2.11. Inspection and Entry

The permittee shall allow any authorized representative of the Secretary, upon the presentation of credentials and other documents as may be required by law, to perform the following:

a. At all reasonable times (including all times in which the facility is in operation) enter upon the permittee's premises where a source is located or emissions related activity is conducted, or where records must be kept under the conditions of this permit;

b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;

c. Inspect at reasonable times (including all times in which the facility is in operation) any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit;

d. Sample or monitor at reasonable times substances or parameters to determine compliance with the permit or applicable requirements or ascertain the amounts and types of air pollutants discharged.

2.12. Emergency

2.12.1. An "emergency" means any situation arising from sudden and reasonable unforeseeable events beyond the control of the source, including acts of God, which situation requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under the permit, due to unavoidable increases in emissions attributable

to the emergency. An emergency shall not include noncompliance to the extent caused by improperly designed equipment, lack of preventative maintenance, careless or improper operation, or operator error.

2.12.2. Effect of any emergency. An emergency constitutes an affirmative defense to an action brought for noncompliance with such technology-based emission limitations if the conditions of Section 2.12.3 are met.

2.12.3. The affirmative defense of emergency shall be demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that:

a. An emergency occurred and that the permittee can identify the cause(s) of the emergency;

b. The permitted facility was at the time being properly operated;

c. During the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards, or other requirements in the permit; and

d. The permittee submitted notice of the emergency to the Secretary within one (1) working day of the time when emission limitations were exceeded due to the emergency and made a request for variance, and as applicable rules provide. This notice must contain a detailed description of the emergency, any steps taken to mitigate emissions, and corrective actions taken.

2.12.4. In any enforcement proceeding, the permittee seeking to establish the occurrence of an emergency has the burden of proof.

2.12.5 The provisions of this section are in addition to any emergency or upset provision contained in any applicable requirement.

2.13. Need to Halt or Reduce Activity Not a Defense

It shall not be a defense for a permittee in an enforcement action that it should have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. However, nothing in this paragraph shall be construed as precluding consideration of a need to halt or reduce activity as a mitigating factor in determining penalties for noncompliance if the health, safety, or environmental impacts of halting or reducing operations would be more serious than the impacts of continued operations.

2.14. Suspension of Activities

In the event the permittee should deem it necessary to suspend, for a period in excess of sixty (60) consecutive calendar days, the operations authorized by this permit, the permittee shall notify the Secretary, in writing, within two (2) calendar weeks of the passing of the sixtieth (60) day of the suspension period.

2.15. Property Rights

This permit does not convey any property rights of any sort or any exclusive privilege.

2.16. Severability

The provisions of this permit are severable and should any provision(s) be declared by a court of competent jurisdiction to be invalid or unenforceable, all other provisions shall remain in full force and effect.

2.17. Transferability

This permit is transferable in accordance with the requirements outlined in Section 10.1 of 45CSR13. **[45CSR§13-10.1.]**

2.18. Notification Requirements

The permittee shall notify the Secretary, in writing, no later than thirty (30) calendar days after the actual startup of the operations authorized under this permit.

2.19. Credible Evidence

Nothing in this permit shall alter or affect the ability of any person to establish compliance with, or a violation of, any applicable requirement through the use of credible evidence to the extent authorized by law. Nothing in this permit shall be construed to waive any defense otherwise available to the permittee including, but not limited to, any challenge to the credible evidence rule in the context of any future proceeding.

3.0. Facility-Wide Requirements

3.1. Limitations and Standards

3.1.1. **Open burning.** The open burning of refuse by any person, firm, corporation, association or public agency is prohibited except as noted in 45CSR§6-3.1.
[45CSR§6-3.1.]

3.1.2. **Open burning exemptions.** The exemptions listed in 45CSR§6-3.1 are subject to the following stipulation: Upon notification by the Secretary, no person shall cause, suffer, allow or permit any form of open burning during existing or predicted periods of atmospheric stagnation. Notification shall be made by such means as the Secretary may deem necessary and feasible.
[45CSR§6-3.2.]

3.1.3. **Asbestos.** The permittee is responsible for thoroughly inspecting the facility, or part of the facility, prior to commencement of demolition or renovation for the presence of asbestos and complying with 40 C.F.R. § 61.145, 40 C.F.R. § 61.148, and 40 C.F.R. § 61.150. The permittee, owner, or operator must notify the Secretary at least ten (10) working days prior to the commencement of any asbestos removal on the forms prescribed by the Secretary if the permittee is subject to the notification requirements of 40 C.F.R. § 61.145(b)(3)(i). The USEPA, the Division of Waste Management, and the Bureau for Public Health - Environmental Health require a copy of this notice to be sent to them.
[40CFR§61.145(b) and 45CSR§34]

3.1.4. **Odor.** No person shall cause, suffer, allow or permit the discharge of air pollutants which cause or contribute to an objectionable odor at any location occupied by the public.
[45CSR§4-3.1] ***[State Enforceable Only]***

3.1.5. **Permanent shutdown.** A source which has not operated at least 500 hours in one 12-month period within the previous five (5) year time period may be considered permanently shutdown, unless such source can provide to the Secretary, with reasonable specificity, information to the contrary. All permits may be modified or revoked and/or reapplication or application for new permits may be required for any source determined to be permanently shutdown.
[45CSR§13-10.5.]

3.1.6. **Standby plan for reducing emissions.** When requested by the Secretary, the permittee shall prepare standby plans for reducing the emissions of air pollutants in accordance with the objectives set forth in Tables I, II, and III of 45CSR11.
[45CSR§11-5.2.]

3.2. Monitoring Requirements

[Reserved]

3.3. Testing Requirements

3.3.1. **Stack testing.** As per provisions set forth in this permit or as otherwise required by the Secretary, in accordance with the West Virginia Code, underlying regulations, permits and orders, the permittee shall conduct test(s) to determine compliance with the emission limitations set forth in this permit and/or established or set forth in underlying documents. The Secretary, or his duly authorized representative, may at his option witness or conduct such test(s). Should the Secretary

exercise his option to conduct such test(s), the operator shall provide all necessary sampling connections and sampling ports to be located in such manner as the Secretary may require, power for test equipment and the required safety equipment, such as scaffolding, railings and ladders, to comply with generally accepted good safety practices. Such tests shall be conducted in accordance with the methods and procedures set forth in this permit or as otherwise approved or specified by the Secretary in accordance with the following:

a. The Secretary may on a source-specific basis approve or specify additional testing or alternative testing to the test methods specified in the permit for demonstrating compliance with 40 C.F.R. Parts 60, 61, and 63 in accordance with the Secretary's delegated authority and any established equivalency determination methods which are applicable. If a testing method is specified or approved which effectively replaces a test method specified in the permit, the permit may be revised in accordance with 45CSR§13-4. or 45CSR§13-5.4 as applicable.

b. The Secretary may on a source-specific basis approve or specify additional testing or alternative testing to the test methods specified in the permit for demonstrating compliance with applicable requirements which do not involve federal delegation. In specifying or approving such alternative testing to the test methods, the Secretary, to the extent possible, shall utilize the same equivalency criteria as would be used in approving such changes under Section 3.3.1.a. of this permit. If a testing method is specified or approved which effectively replaces a test method specified in the permit, the permit may be revised in accordance with 45CSR§13-4. or 45CSR§13-5.4 as applicable.

c. All periodic tests to determine mass emission limits from or air pollutant concentrations in discharge stacks and such other tests as specified in this permit shall be conducted in accordance with an approved test protocol. Unless previously approved, such protocols shall be submitted to the Secretary in writing at least thirty (30) days prior to any testing and shall contain the information set forth by the Secretary. In addition, the permittee shall notify the Secretary at least fifteen (15) days prior to any testing so the Secretary may have the opportunity to observe such tests. This notification shall include the actual date and time during which the test will be conducted and, if appropriate, verification that the tests will fully conform to a referenced protocol previously approved by the Secretary.

[WV Code § 22-5-4(a)(15)]

3.4. Recordkeeping Requirements

3.4.1. **Retention of records.** The permittee shall maintain records of all information (including monitoring data, support information, reports, and notifications) required by this permit recorded in a form suitable and readily available for expeditious inspection and review. Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation. The files shall be maintained for at least five (5) years following the date of each occurrence, measurement, maintenance, corrective action, report, or record. At a minimum, the most recent two (2) years of data shall be maintained on site. The remaining three (3) years of data may be maintained off site, but must remain accessible within a reasonable time. Where appropriate, the permittee may maintain records electronically (on a computer, on computer floppy disks, CDs, DVDs, or magnetic tape disks), on microfilm, or on microfiche.

3.4.2. **Odors.** For the purposes of 45CSR4, the permittee shall maintain a record of all odor complaints received, any investigation performed in response to such a complaint, and any responsive action(s) taken.
[45CSR§4. *State Enforceable Only.*]

3.5. Reporting Requirements

3.5.1. **Responsible official.** Any application form, report, or compliance certification required by this permit to be submitted to the DAQ and/or USEPA shall contain a certification by the responsible official that states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

3.5.2. **Confidential information.** A permittee may request confidential treatment for the submission of reporting required by this permit pursuant to the limitations and procedures of W.Va. Code § 22-5-10 and 45CSR31.

3.5.3. **Correspondence.** All notices, requests, demands, submissions and other communications required or permitted to be made to the Secretary of DEP and/or USEPA shall be made in writing and shall be deemed to have been duly given when delivered by hand, or mailed first class with postage prepaid to the address(es) set forth below or to such other person or address as the Secretary of the Department of Environmental Protection may designate:

If to the DAQ:
Director
WVDEP
Division of Air Quality
601 57th Street
Charleston, WV 25304-2345

If to the US EPA:
Associate Director
Office of Enforcement and Permits Review
(3AP12)
U.S. Environmental Protection Agency
Region III
1650 Arch Street
Philadelphia, PA 19103-2029

3.5.4. **Operating Fee**

3.5.4.1. In accordance with 45CSR30 – Operating Permit Program, the permittee shall submit a certified emissions statement and pay fees on an annual basis in accordance with the submittal requirements of the Division of Air Quality. A receipt for the appropriate fee shall be maintained on the premises for which the receipt has been issued, and shall be made immediately available for inspection by the Secretary or his/her duly authorized representative.

3.5.5. **Emission inventory.** At such time(s) as the Secretary may designate, the permittee herein shall prepare and submit an emission inventory for the previous year, addressing the emissions from the facility and/or process(es) authorized herein, in accordance with the emission inventory submittal requirements of the Division of Air Quality. After the initial submittal, the Secretary may, based upon the type and quantity of the pollutants emitted, establish a frequency other than on an annual basis.

4.0. Source-Specific Requirements

4.1. Limitations and Standards

4.1.1. Process criteria pollutant emissions shall not exceed the following maximum hourly and annual emission limits:

Emission Point Name	Emission Point ID	Process Criteria Pollutant Emission Limits									
		VOC		SO_2		NO_x		CO		PM_{10}	
		PPH	TPY	PPH	TPY	PPH	TPY	PPH	TPY	PPH	TPY
Furnace	T1CAE	0.05	0.21	0.01	0.03	0.83	3.65	0.70	3.07	0.06	0.28
Furnace	T1CBE	0.07	0.30	0.01	0.04	1.24	5.45	1.04	4.58	0.09	0.42
Furnace	T1CCE	0.07	0.30	0.01	0.04	1.24	5.45	1.04	4.58	0.09	0.42
Furnace	T1CDE	0.07	0.29	0.01	0.04	1.19	5.25	1.00	4.41	0.09	0.40
Dryers	T1DBE	1.17	0.19	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Mixed Gas Holder	TIGNE	1,380	7.95	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Raw Material Unloading	T1JBE	0.01	0.01	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
North Tank Farm Scrubber	T2ERE	1.74	0.64	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Trailer Loading	T2EXE	0.76	0.45	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Analyzer	T2EYE	0.26	1.13	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Storage Tank	T4GBE	1.64	0.02	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cooling Tower	T7AKE	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	1.3	4.23
Portable Container Facility	T7EME	1.0	0.01	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Thermal Converter Stack	T7IME	1.45	6.47	0.64	1.77	3.30	5.29	0.57	2.46	0.42	1.96
Silo	T7IOE	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	0.4	0.09
Emergency Generator	T7JJE	0.36	0.09	2.2	0.55	40.4	10.09	6.5	1.61	0.4	0.09
South Central Vent Stack	T7XIE	2,795	34.14	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

Compliance with the above emission limits shall demonstrate compliance with the less stringent 45CSR§2-4.1.b hourly particulate and 45CSR§10-3.1.e hourly sulfur dioxide emission limits for Furnace T1CD venting through emission point T1CDE; the less stringent 45CSR§7-4.1 hourly particulate emission limits for emission units T7AK and T7IO venting through emission points T7AKE, and T7IOE; the less stringent 45CSR§6-4.1 hourly particulate emission limit for the Thermal Converter T7IMC venting through emission point T7IME.

4.1.2. Process hazardous air pollutant (HAP) emissions shall not exceed the following maximum hourly and annual emission limits:

Emission Point Name	Emission Point ID	Process Hazardous Air Pollutant Emission Limits											
		Chromium		HCl		HF		Methanol		Methylene Chloride		Toluene	
		PPH	TPY	PPH	TPY	PPH	TPY	PPH	TPY	PPH	TPY	PPH	TPY
North Tank Farm Scrubber	T2ERE	N/A	N/A	0.6	1.78	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Storage Tank	T4GBE	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	1.64	0.02
Brine System Losses	T7XIE	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	33.95a	N/A	N/A
Portable Container Facility	T7EME	N/A	N/A	N/A	N/A	0.01	0.01	N/A	N/A	N/A	N/A	N/A	N/A
Thermal Converter Stack	T7IME	0.03	0.04	0.06	0.26	0.54	2.51	N/A	N/A	0.01	0.01	0.01	0.01
Neutralization System Scrubber	T7JDE	N/A	N/A	0.12	0.01	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
South Central Vent Stack	T7XIE	N/A	N/A	14.7	1.54	N/A	N/A	6.1	0.03	N/A	N/A	N/A	N/A

a- This is total methylene chloride losses and includes fugitives.

Compliance with the above hydrochloric acid emission limits shall demonstrate compliance with the less stringent 45CSR§7-4.2 hydrochloric acid concentration limits for emission points T2ERE, T7JDE, and T7XIE.

4.1.3. Emissions of ammonium perfluorooctanoate (APFO) from emission point T7IME shall not exceed 0.00037 pounds per hour and 0.0010 pounds per year.

4.1.4. Total maintenance emissions from all sources shall not exceed the following maximum annual emission limits:

Pollutant Name	Maintenance Emission Limits (TPY)
VOC	19.8
HCl	0.56
HF	0.01
Methanol	0.46
Toluene	0.03
Acetonitrile	0.01

4.1.5. All control devices shall be maintained and operated in accordance with the information submitted in Permit Application R13-1823A through R13-1823I. The operating conditions which shall be adhered to include the following:

Thermal Converter - Combustion (T7IMC)	**Value**	**Units**
Minimum Combustion Chamber Temperature	1,800	°F
Maximum Waste Gas Feed Rate	1,910	pph
Maximum Charge Rate (HFC-23 from tank car unloading for CISWI)	As required under CISWI monitoring requirements in Condition 4.2.2.	
Thermal Converter - Scrubber (T7IMC)	**Value**	**Units**
Maximum Gas Stream Flow	As required under the 40 C.F.R. 63, Subpart FFFF monitoring requirements in Condition 4.2.7.	
Minimum Pressure Drop Across the Wet Scrubber	As required under the CISWI monitoring requirements in Condition 4.2.2.	
Minimum Re-circulated Liquor Flow (1st Stage)	40	gpm
Minimum Re-circulation Pump Current (1st Stage) Note: If minimum re-circulation liquor flow indication above is less than 40 gpm (i.e. flow meter malfunction), then the recirculation pump amp load must be maintained above 1.0 amp load as a back-up indication to flow.	1.0	Amps
4th (Final Scrubbing) Stage Requirements:		
Minimum Scrubber Liquor Flow (4^{th} Stage) (Dilute Na_2SO_3, pH adjusted)	The most stringent of the CISWI monitoring requirements in Condition 4.2.2, the 40 C.F.R. 63, Subpart FFFF monitoring requirements in Condition 4.2.7, or the 40 C.F.R. 63, Subpart NNNNN monitoring requirements in Condition 4.2.4.	
Liquor Oxidation/Reduction Potential (4^{th} Stage)	≤ +400	millivolts vs. Ag/AgCl ref. electrode
Minimum Scrubber Liquor pH (4^{th} Stage)	The most stringent of the CISWI monitoring requirements in Condition 4.2.2, the 40 C.F.R. 63, Subpart FFFF monitoring requirements in Condition 4.2.7, or the 40 C.F.R. 63, Subpart NNNNN monitoring requirements in Condition 4.2.4.	
Maximum Scrubber Effluent pH (4^{th} Stage)	As required under the 40 C.F.R. 63, Subpart NNNNN monitoring requirements in Condition 4.2.4.	
Neutralization System Scrubber (T7JDC)	**Value**	**Units**
Scrubber Liquor Flow Range	0.5 to 2	gpm
Daily Confirmation of Blower Operation		

4.1.6. Column T4XK (column process vent and pot vent) shall not vent to atmosphere when the Thermal Converter (T7IMC) is down.

4.1.7. Process emissions from the following equipment shall be directed to the indicated control device:

Equipment	Equipment ID No.	Control Device	Control Device ID No.
Air Stripper	T2ES	North Tank Farm Scrubber	T2ERC
Column	T4GM	Thermal Converter	T7IMC
Column - Pot Vent	T4XK	Thermal Converter	T7IMC
Column - Process Vent	T4XK	Thermal Converter	T7IMC
Storage Tanks	T1BP - T	South Stillhouse Scrubber	T7XIC
Column - Operating Vents	T1XD	South Stillhouse Scrubber	T7XIC
Column	T2XM	South Stillhouse Scrubber	T7XIC
TFE/CO2 System Vents	T2EX	Thermal Converter	T7IMC

4.1.8. Maintenance emissions from the following equipment shall be directed to the indicated control device:

Equipment	Equipment ID No.	Control Device	Control Device ID No.
Storage Tank & Vaporizer	T1LF	North Tank Farm Scrubber South Stillhouse Scrubber	T2ERC T7XIC
Coolers	T1DD - F	Thermal Converter	T7IMC
Bag Filters	T1DG &H	Thermal Converter	T7IMC
Column	T1XD	Thermal Converter	T7IMC
Column	T4GM	Thermal Converter	T7IMC
Storage Tank	T4GO	Thermal Converter	T7IMC
Storage Tanks	T1BP - T	South Stillhouse Scrubber	T7XIC

4.1.9. The furnaces T1CA, T1CB, T1CC, and T1CD shall be operated and maintained in accordance with the manufacturer's recommendations and specifications and in a manner consistent with good operating practices and shall only burn natural gas.

4.1.10. 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.
[45CSR§2-3.1]

4.1.11. Incinerators, including all associated equipment and grounds, shall be designed, operated and maintained so as to prevent the emission of objectionable odors. *(T7IME)*
[45CSR§6-4.6.]

4.1.12. No person shall cause, suffer, allow or permit emission of smoke and/or particulate matter into the open air from any process source operation which is greater than twenty (20) percent opacity. *(T7AKE, T2ERE, T7JDE, and T7XIE)*
[45CSR§7-3.1.]

4.1.13. The provisions of 4.1.12. shall not apply to smoke and/or particulate matter emitted from any process source operation which is less than forty (40) percent opacity for any period or periods aggregating no more than five (5) minutes in any sixty (60) minute period. *(T7AKE, T2ERE, T7JDE, and T7XIE)*
[45CSR§7-3.2.]

4.1.14. No person shall cause, suffer, allow, or permit visible emissions from any storage structure(s) associated with any manufacturing process(es) that pursuant to 45CSR§7-5.1 is required to have a full enclosure and be equipped with a particulate matter control device. *(T7IOE)*
[45CSR§7-3.7.]

4.1.15. **CISWI 111(d)/129.** The permittee shall meet the following emission limitations for the thermal converter and associated scrubber (T7IMC):

Pollutant	Emission Limitation[a]	Averaging Time	Test Method
Cadmium	0.004 milligrams per dry standard cubic meter	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 29)
Carbon monoxide	157 parts per million by dry volume	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 10, 10A, or 10B)
Dioxins/furans (toxic equivalency basis)	0.41 nanograms per dry standard cubic meter	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 23)
Hydrogen chloride	62 parts per million by dry volume	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 26A)
Lead	0.04 milligrams per dry standard cubic meter	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 29)
Mercury	0.47 milligrams per dry standard cubic meter	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 29)
Opacity	10 percent	6-minute averages	Performance test (40 C.F.R. 60, Appendix A, Method 9)
Oxides of nitrogen	388 parts per million by dry volume	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Methods 7, 7A, 7C, 7D, or 7E)
Particulate matter	70 milligrams per dry standard cubic meter	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 5 or 29)
Sulfur dioxide	20 parts per million by dry volume	3-run average (1 hour minimum sample time per run)	Performance test (40 C.F.R. 60, Appendix A, Method 6 or 6C)

[a] All emission limitations (except for opacity) are measured at 7 percent oxygen, dry basis at standard conditions.

Compliance with the above 10 percent opacity limit shall demonstrate compliance with the less stringent twenty percent opacity limit of 45CSR§6-4.3.

[45CSR§18-7.3 and Table 18-B; 40 C.F.R. §§62.12155 through 62.12157; 45CSR§6-4.3]

4.1.16. **CISWI 111(d)/129.** The emission limitations and operating limits specified under 4.1.15 and the operating limits specified under 4.2.2 shall apply at all times except during CISWI unit startups, shutdowns, or malfunctions. Each malfunction shall last no longer than 3 hours. **[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]**

4.1.17. **CISWI 111(d)/129.** The permittee shall burn the same types of waste used to establish the operating limits specified under 4.2.2. **[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]**

4.1.18. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall meet the applicable emission limit and work practice standard in Table 1 to 40 C.F.R. 63, Subpart NNNNN for each emission stream from an HCl process vent; each emission stream from an HCl storage tank; each emission stream from an HCl transfer operation; and each emission stream resulting from leaks from equipment in HCl service.

Table 1 to 40 C.F.R. 63, Subpart NNNNN for Existing Sources

For each…	You must meet the following emission limit and work practice standard
1. Emission stream from an HCl process vent at an existing source	a. Reduce HCl emissions by 99 percent or greater or achieve an outlet concentration of 20 ppm by volume or less; and
	b. Reduce Cl_2 emissions by 99 percent or greater or achieve an outlet concentration of 100 ppm by volume or less.
2. Emission stream from an HCl storage tank at an existing source	Reduce HCl emissions by 99 percent or greater or achieve an outlet concentration of 120 ppm by volume or less.
3. Emission stream from an HCl transfer operation at an existing source	Reduce HCl emissions by 99 percent or greater or achieve an outlet concentration of 120 ppm by volume or less.
4. Emission stream from leaking equipment in HCl service at existing and new sources	a. Prepare and operate at all times according to an equipment LDAR plan that describes in detail the measures that will be put in place to detect leaks and repair them in a timely fashion; and
	b. Submit the plan to the Administrator for comment only with your Notification of Compliance Status; and
	c. You may incorporate by reference in such plan existing manuals that describe the measures in place to control leaking equipment emissions required as part of other federally enforceable requirements, provided that all manuals that are incorporated by reference are submitted to the Administrator.

(T2ERE, T7IMC) **[45CSR34; 40 C.F.R. §§63.8990(a) and 63.9000(a); Table 1 to 40 C.F.R. 63, Subpart NNNNN]**

4.1.19. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall meet all applicable general requirements of 40 C.F.R. §63.9005. **[45CSR34; 40 C.F.R. §63.9005]**

4.1.20. **40 C.F.R. 63, Subpart FFFF.** The Fluoropolymers Business Unit has been determined to be subject to the following requirements of 40 C.F.R. 63, Subpart FFFF – "National Emission Standards for Hazardous Air Pollutants: Miscellaneous Organic Chemical Manufacturing."

a. **General Requirements.** The permittee shall comply with all applicable general requirements specified in Table 12 to 40 C.F.R. 63, Subpart FFFF and 40 C.F.R. §§63.2450 and 63.2540. **[45CSR34; 40 C.F.R. §§63.2450 and 63.2540; Table 12 to 40 C.F.R. 63, Subpart FFFF]**

b. **Hydrogen Halide and Halogen HAP Emissions from Process Vents.** The permittee shall comply with each emission limit in Table 3 to 40 C.F.R. 63, Subpart FFFF and each applicable requirement specified in 40 C.F.R. §63.2465 for process vents that emit hydrogen halide and halogen HAPs.

i. **Hydrogen Halide and Halogen HAP Process Vents.** For a process with uncontrolled hydrogen halide and halogen HAP emissions from process vents ≥ 1,000 lb/yr, the permittee has chosen to reduce collective hydrogen halide and halogen HAP emissions by ≥ 99 percent by weight or to an outlet concentration ≤ 20 ppm_v by venting through one or more closed-vent systems to any combination of control devices. *(Emission Units: C2ES, T1BW, T1BX, T1XC, and T1XD; Control Devices: T7XIC and T7IMC and/or its associated Scrubber)*

[45CSR34; 40 C.F.R. §63.2465; Table 3 to 40 C.F.R. 63, Subpart FFFF]

c. **Equipment Leaks.** The permittee shall comply with each applicable requirement of 40 C.F.R. §63.2480 and Table 6 of 40 C.F.R. 63, Subpart FFFF, and either 40 C.F.R. 63, Subpart H, 40 C.F.R. 63, Subpart UU, or 40 C.F.R. 65, Subpart F for the applicable Fluoropolymers equipment components that are in organic HAP service. **[45CSR34; 40 C.F.R. §63.2480; Table 6 to 40 C.F.R. 63, Subpart FFFF]**

d. **Wastewater Streams.** The permittee shall comply with the applicable requirements of 40 C.F.R. §§63.105, 63.132 through 63.148, 63.2485, and Table 7 to 40 C.F.R. 63, Subpart FFFF for the Fluoropolymers wastewater streams. **[45CSR34; 40 C.F.R. §63.2485; Table 7 to 40 C.F.R. 63, Subpart FFFF]**

4.1.21. **APFO Emission Concentration Limitation.** In accordance with Consent Order GWR-2001-019 and the Additional Obligations Notice dated March 13, 2003, the permittee shall limit the annual average modeled exposure levels for ammonium perfluorooctanoate (CAS3825-26-1 and hereby abbreviated as APFO) to no more than the C-8 Assessment of Toxicity (CAT) Team recommended airborne screening level of 1 $\mu g/m^3$ in any area not subject to controlled access by the permittee when modeled using Industrial Source Complex 3 Short Term (ISC3ST) modeling software. As stated in the referenced order, the 1 $\mu g/m^3$ screening level will be the basis for compliance until such time as the United States Environmental Protection Agency promulgates a standard for APFO that is applicable for emissions from this facility.

4.1.22. **APFO Emission Modeling Requirements.** As a threshold test for demonstrating compliance with the screening level described in Requirements 4.1.21, the actual annualized APFO emission from APFO source(s) in this permit shall be no greater than the permitted APFO emission limits set forth by 4.1.3.

In the event such actual annual APFO emissions exceed the permitted annual APFO emission limits or additional APFO sources not currently covered by a permit in accordance to 45CSR13 are identified, compliance with the screening level described in 4.1.21 shall be demonstrated by modeling actual annual APFO emissions from all sources at the facility.

In the event the permittee proposes a change in APFO emission parameters for equipment covered by this permit or additional APFO sources not currently covered by a permit in accordance to 45CSR13, compliance with the screening level described in 4.1.21 shall be demonstrated by modeling permitted annual APFO emission from all sources at the facility, including emissions related to such proposed changes.

Modeling of facility-wide actual or permitted APFO emissions from all APFO emission sources shall use Air Dispersion Modeling in accordance with Appendix W to 40 CFR Part 51 (Guidelines on Air Quality Models), on-site meteorology date (1996 or more recent calendar year), and the most current and quantifiable stack – specific actual or permitted APFO emissions, as appropriate, as well as physical stack parameters.

All records specified above shall be maintained according to the condition specified in 40 CFR 63.10(b)(1) and shall be certified by a Responsible Official upon request or submittal to the Director, or his/her duly authorized representative.

4.1.23. For the purpose of modeling, as described in Section 4.1.22, the emission of APFO from sources Associated with this permit, shall include the emission points and discharge specifications shown in the following Table 4.1.23.

Table 4.1.23. – APFO Emission Point Specifications

Emission Point	Discharge Area (ft^2)	Height Above Grade (ft)	Volume Flow Rate (ACFM)	Temp. (°F)	UTM Coordinates	
					Northing (m)	Easting (m)
T7IME	1.39	150	1,788	86	4,346,847	442,025

4.1.24. The permitted facility is subject to the requirements of 45CSR21 – "Regulation to Prevent and Control Air Pollution from the Emission of Volatile Organic Compounds" provided, however, that compliance with any more stringent VOC requirements under 4.1.1, shall also be demonstrated. Compliance with WV Division of Air Quality permit R13-2617 or any amendments thereto, and including LDAR, shall demonstrate compliance with the applicable requirements of 45CSR21.

4.1.25. The permitted facility is subject to the requirements of 45CSR27 – "To Prevent and Control the Emissions of Toxic Air Pollutants", provided, however, that compliance with any more stringent methylene chloride requirements under 4.1.2, shall also be demonstrated. Compliance with WV Division of Air Quality permit R13-2617 or any amendments thereto, and including LDAR, shall demonstrate compliance with the applicable requirements of 45CSR27.

4.1.26. **Operation and Maintenance of Air Pollution Control Equipment.** The permittee shall, to the extent practicable, install, maintain, and operate all pollution control equipment listed in Section 1.0 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.
[45CSR§13-5.11.]

4.2. Monitoring Requirements

4.2.1. The permittee shall conduct visible emissions monitoring during periods of commercial operation for the following emission points and equipment subject to visible emissions or opacity limits under 45CSR6 and 45CSR7. *(T7IOE, T7AKE, T7IME)*

If commercial production is nearly continuous, monitoring shall be conducted at least once per month with a maximum of forty-five (45) days between consecutive readings. If commercial production is intermittent, monitoring shall be conducted at least once per calendar month or a record shall be prepared to document that no commercial production was conducted in the month. These checks shall be performed during periods of normal commercial operation of emission sources that vent from the referenced emission points for a sufficient time interval to determine if there is a visible emission. If visible emissions are identified during the visible emission check, or at any other time regardless of operations, the permittee shall conduct a visible emission evaluation per 45CSR7A (for T7IOE and T7AKE) or 40 C.F.R. 60, Appendix A, Method 9 (for T7IME) within three (3) days of the first identification of visible emissions. A 45CSR7A evaluation shall not be required if the visible emission condition is corrected within seventy-two (72) hours after the visible emission and the sources are operating at normal conditions.

a. For source emissions from the storage silo (T7IO) through emission point (T7IOE), monitoring shall be conducted during each material unloading event.

b. The Emergency Generator (T7JJ) shall be used only for emergencies and for routine readiness checks. Regular visual emissions observations are not required.

4.2.2. **CISWI 111(d)/129.** The permittee shall install, calibrate (to manufacturer's specifications), maintain, and operate devices to continuously monitor the following operating parameters for the thermal converter and associated scrubber (T7IMC):

a. **Maximum charge rate** (for continuous units, maximum charge rate is 110 percent of the average charge rate measured during the most recent performance test demonstrating compliance with all applicable emission limitations);

b. **Minimum pressure drop across the wet scrubber** (calculated as 90 percent of the average pressure drop across the wet scrubber measured during the most recent performance test demonstrating compliance with the particulate matter emission limitations);

c. **Minimum scrubber liquor flow rate** (calculated as 90 percent of the average liquor flow rate at the inlet to the wet scrubber measured during the most recent performance test demonstrating compliance with all applicable emission limitations);

d. **Minimum scrubber liquor pH** (calculated as 90 percent of the average liquor pH at the inlet to the wet scrubber measured during the most recent performance test demonstrating compliance with the HCl emission limitation).

Operation above the established maximum or below the established minimum operating limits constitutes a deviation from the established operating limits. Three-hour rolling average values are used to determine compliance unless a different averaging period is approved by the Administrator.

[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]

4.2.3. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall demonstrate compliance with the HCl and Cl_2 emission limits of 4.1.18 for T2ERE by meeting the combination of the following conditions:

a. Scrubber base temperature at or below 82 °C (process instrument measurement), AND

b. Fresh water make-up to the top section of the scrubber, measured with a flow meter (process instrument measurement) at or above 1,000 pph. Inherent in the scrubber design, 1,000 pph liquid flow is the minimum required to assure proper wetting of the packing and, therefore, proper scrubbing; OR

c. Operation of the recycle acid flow system through a restricting orifice. The restriction orifice is designed to assure that proper pump operation will provide flow well above the minimum required flow to wet the scrubber packing under all operational scenarios. Therefore, verification of proper operation of the recycle acid pump is indicated by the pump power monitor installed upon the pump. For the column to be properly operated with the packing wetted adequately) the power monitor must read above a 1.4 amp minimum. This amp rating corresponds to the pump manufacturer's minimum recommended sustained flow rate for the pump.

(Emission Point: T2ERE; Control Device: T2ERC) **[45CSR34; 40 C.F.R. §§ 63.9000(b) and 63.9025(b); Table 2 to 40 C.F.R. 63, Subpart NNNNN; Letter from Bernard E. Turlinski, Associate Director, Office of Enforcement and Permits Review, EPA Region III, to Robert L. Ritchey, Sr. Environmental Control Consultant of DuPont Washington Works, dated April 4, 2006]**

4.2.4. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall establish the following operating limits in order to demonstrate compliance with the HCl and Cl_2 emission limits of 4.1.18 for T7IMC:

a. The minimum value as the operating limit for scrubber inlet liquid or recirculating liquid flow rate, as appropriate. The minimum values shall be based on the scrubber inlet liquid or recirculating liquid flow rate, as appropriate; and

b. The minimum and maximum values as the operating limits for scrubber effluent pH.

The operating limits shall be defined and based on the results of the most recent compliance testing which successfully demonstrates compliance with the applicable emission standards specified in 4.1.18. Subsequent testing requirements are specified in 4.3.3.

(Emission Point: T7IME; Control Device T7IMC) **[45CSR34; 40 C.F.R. §§ 63.9000(b) and 63.9020(e)(1); Table 2 to 40 C.F.R. 63, Subpart NNNNN]**

4.2.5. **40 C.F.R. 63, Subpart NNNNN.** For each operating parameter that is required to be monitored under 4.2.3 and 4.2.4, the permittee shall install, operate, and maintain each CMS according to the requirements in 40 C.F.R. §63.9025(a); or as approved in an alternative monitoring plan under 40 C.F.R. §63.9025(b). **[45CSR34; 40 C.F.R. §63.9025(a)]**

4.2.6. **40 C.F.R. 63, Subpart FFFF.** The permittee shall perform all required monitoring in compliance with the applicable general provisions of 40 C.F.R. 63, Subpart FFFF, per: 40 C.F.R. §§63.2450 and 63.2540; Table 12 to 40 C.F.R. 63, Subpart FFFF; and 40 C.F.R. 63, Subpart A. **[45CSR34; 40 C.F.R. §§63.2450 and 63.2540; Table 12 to 40 C.F.R. 63, Subpart FFFF; 40 C.F.R. 63, Subpart A]**

4.2.7. **40 C.F.R. 63, Subpart FFFF.** The permittee shall demonstrate compliance with the hydrogen halide and halogen HAP emission standards listed in 4.1.20.b.i for the Thermal Converter (T7IMC) and associated scrubber, by maintaining the following monitoring parameters as established in the Notification of Compliance Status (NOCS) Report dated October 6, 2008:

Thermal Converter – Scrubber (T7IMC)	Monitoring Frequency	Limit
Minimum Scrubber Effluent pH	Continuous	7.1
Minimum Scrubber Influent Liquor Flow	Continuous	40 gpm
Maximum Gas Stream Flow	Continuous	12,700 pph

(Emission Units: C2ES, T1BW, T1BX, and T1XC; Control Device: T7IMC and associated Scrubber) **[45CSR34; 40 C.F.R. §§63.988(c), 63.994(c) and 63.996]**

4.2.8. **40 C.F.R. 63, Subpart FFFF.** The permittee shall demonstrate compliance with the hydrogen halide and halogen HAP emission standards listed in 4.1.20.b.i for the South Still House Scrubber (T7XIC), by maintaining the following monitoring parameters as established in the Notification of Compliance Status (NOCS) Report dated October 6, 2008 and the supplemental alternative monitoring proposal dated March 11, 2010:

South Still House Scrubber (T7XIC)	Monitoring Frequency	Limit
Maximum Scrubber Temperature	Continuous	140 °F (60 °C)
Minimum Scrubber Liquor Circulation Rate	Continuous	200 gpm
Maximum Vent Flow Discharge Rate	Continuous	2,194 lb/hr

(Emission Unit: T1XD; Control Device: T7XIC) **[40 C.F.R. §§63.994(c), 63.996(d), and 63.999(d); Letter from David F. Altman, Sr. Environmental Control Consultant of DuPont Washington Works to John Benedict, Director of DAQ and carbon copy to Judy Katz, Director of EPA Region III, dated May 8, 2008; Design Evaluation and Petition Document for the South Stillhouse Scrubber T7XIC, dated March 11, 2010; Alternative Monitoring Approval for Water Scrubber ID (T7XIC) from John Benedict, Director of DAQ to Karl J. Boelter, Plant Manager, dated June 16, 2010]**

4.3. Testing Requirements

4.3.1. **CISWI 111(d)/129.** The permittee shall conduct an annual performance test for particulate matter, hydrogen chloride, and opacity to determine compliance with the emission limits specified in 4.1.15. The annual performance test shall be conducted using the test methods specified in 4.1.15. Subsequent annual performance tests shall be conducted within 12 months of the previous one.

The permittee may test less often for a given pollutant if there is test data for at least 3 years, and all performance tests for the pollutant (particulate matter, hydrogen chloride, or opacity) over 3 consecutive years show compliance with the emission limits specified 4.1.15. In this case, the permittee does not have to conduct a performance test for that pollutant for the next 2 years.

The permittee must conduct a performance test during the third year and no more than 36 months following the previous performance test. If the CISWI unit continues to meet the emission limitation for particulate matter, hydrogen chloride, or opacity, the permittee may choose to conduct performance tests for these pollutants every third year, but each test must be within 36 months of the previous performance test.

If a performance test shows a deviation from an emission limitation for particulate matter, hydrogen chloride, or opacity, the permittee must conduct annual performance tests for that pollutant until all performance tests over a 3-year period show compliance.

The permittee may conduct a repeat performance test at any time to establish new values for the operating limits. The Administrator may request a repeat performance test at any time.

The permittee must repeat the performance test if the feed stream is different than the feed streams used during any performance test used to demonstrate compliance.

[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]

4.3.2. **CISWI 111(d)/129.** The permittee shall conduct an initial performance test, as required under 40 C.F.R. §60.8, to determine compliance with the emission limits specified in 4.1.15 and to establish operating limits using the procedure in 40 C.F.R. §60.2675 or 40 C.F.R. §60.2680. The initial performance test must be conducted using the test methods listed in 4.1.15 and the procedures in 40 C.F.R. §60.2690. **[45CSR§§18-7.3.a, 7.3.f, and 7.3.g; 40 C.F.R. §§62.12155 through 62.12157]**

4.3.3. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall conduct all subsequent applicable performance tests according to the procedures in 40 C.F.R. §63.9020 on the earlier of the title V operating permit renewal or within 5 years of issuance of the title V permit. The results of the subsequent performance tests shall be reported within 60 days after the completion of the test. This report should also verify that the operating limits for the affected source have not changed or provide documentation of revised operating limits established as specified in Table 2 to 40 C.F.R. 63, Subpart NNNNN. The reports for all subsequent performance tests should include all applicable information required in 40 C.F.R. §63.9050.

The permittee shall not be required to conduct a performance test for an emission point for which a performance test was conducted within the previous 5-year period, using the same test methods specified in 40 C.F.R. §63.9020 and for which either no deliberate process changes have been made since the test, or the owner or operator can demonstrate that the results of the performance

test, with or without adjustments, reliably demonstrate compliance despite process changes. The operating limits reported under the previous performance test shall be sufficient to meet the monitoring requirements in 40 C.F.R. 63, Subpart NNNNN.

(Emission Points: T2ERE and T7IME; Control Devices: T2ERC and T7IMC) **[45CSR34, 40 C.F.R. §§63.9015 and 60.9020(d)]**

4.3.4. Any stack serving any process source operation or air pollution control device on any process source operation shall contain flow straightening devices or a vertical run of sufficient length to establish flow patterns consistent with acceptable stack sampling procedures. **[45CSR§7-4.12.]**

4.3.5. **Opacity testing.** Any test to determine compliance with the visible emissions (opacity) limitations set forth in 4.2.1 shall be conducted by personnel appropriately trained for the task. Personnel performing the visual emissions observation shall be trained and familiar with the limitations and restrictions associated with 40 CFR 60 Appendix A – Method 22. Any person performing an opacity observation for compliance assessment in the event of visible emission must be a certified visible emission observer in accordance with 45CSR7A – "Compliance Test Procedures for 45CSR7 – *To Prevent and Control Particulate Air Pollution from Manufacturing Process Operations.*" Nothing in this section, however, shall preclude any permittee or the Secretary from using opacity data from a properly installed, calibrated, maintained and operated continuous opacity monitor as evidence to demonstrate compliance or a violation of visible emission requirements. If continuous opacity monitoring data results are submitted when determining compliance with visible emission limitations for a period of time during which 45CSR7A or Method 22 data indicates noncompliance, the 45CSR7A or Method 22 data shall be used to determine compliance with the visible emission limitations.

4.4. Recordkeeping Requirements

4.4.1. **Record of Monitoring.** The permittee shall keep records of monitoring information that include the following:

a. The date, place as defined in this permit, and time of sampling or measurements;

b. The date(s) analyses were performed;

c. The company or entity that performed the analyses;

d. The analytical techniques or methods used;

e. The results of the analyses; and

f. The operating conditions existing at the time of sampling or measurement.

4.4.2. **Record of Maintenance of Air Pollution Control Equipment.** For all pollution control equipment listed in Section 1.0, the permittee shall maintain accurate records of all required pollution control equipment inspection and/or preventative maintenance procedures.

4.4.3. **Record of Malfunctions of Air Pollution Control Equipment.** For all air pollution control equipment listed in Section 1.0, the permittee shall maintain records of the occurrence and duration of 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.

4.4.4. For the purpose of determining compliance with the process emission limits set forth in 4.1.1 and 4.1.2, and the operating limitations set forth in 4.1.5, 4.1.6, and 4.1.7, the permittee shall maintain records equivalent to the example monthly record keeping form supplied as Attachment A, and the emission reports equivalent to the monthly and annual reports supplied as Attachments D and E. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his duly authorized representative upon request.

4.4.5. For the purpose of determining compliance with the maintenance emission limits set forth in 4.1.4, the permittee shall maintain records equivalent to the example monthly record keeping form supplied as Attachment B, and the emission reports equivalent to the monthly and annual reports supplied as Attachments D and E. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his duly authorized representative upon request.

4.4.6. For the purpose of determining compliance with the control device parameter monitoring specified in 4.1.5, 4.2.2, 4.2.3, 4.2.4, 4.2.7, and 4.2.8, the permittee shall maintain records equivalent to the example monthly record keeping form supplied as Attachment C. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his duly authorized representative upon request.

4.4.7. Notwithstanding the requirements in Section 4.4.3 of this permit, malfunctions (defined as monitoring parameters outside acceptable values defined in 4.1.5, 4.2.2, 4.2.3, 4.2.4, 4.2.7, and 4.2.8) of the North Tank Farm Scrubber (T2ERC), the Thermal Converter (T7IMC), the Neutralization System Scrubber (T7JDC), and/or the South Stillhouse Scrubber (T7XIC) for periods exceeding (30) minutes in duration shall be documented in writing as appendices to the record keeping form supplied as Attachment C. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his duly authorized representative upon request. At a minimum, the following information shall be documented for each malfunction:

a. The equipment involved and associated cause of the malfunction.
b. Steps taken to correct the malfunction.
c. Steps taken to minimize emissions during the malfunction.
d. The duration of the malfunction.
e. The estimated increase in emissions during the malfunction.

f. Any changes or modification to equipment or procedures that would help prevent future recurrence of the malfunction.

In the event a MACT standard requiring a Startup, Shutdown, and Malfunction (SSM) Plan should be found applicable to this permitted process in the future, then that SSM Plan would supercede the provisions of Specific Requirement 4.4.7 above. Until that time, or until notice from the permittee in writing to the Director of plans to adopt an SSM Plan, the provisions of Specific Requirement 4.4.7 will remain applicable.

4.4.8. The permittee shall maintain records of all occurrences of objectionable odors from any of the incinerators. In addition to the date and time of the occurrence, the record shall also include the suspected cause and any actions taken. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his duly authorized representative upon request.

4.4.9. In addition to the monthly records of the quantity of fuel consumed in Furnace T1CD (required to be maintained in Attachment A), the permittee shall also maintain the date and time of startup and shutdown. These records shall be maintained according to the conditions specified in 40 CFR 63.10(b)(1). Such records shall be certified by a "Responsible Official" and made available to the Director or his/her duly authorized representative upon request.
[45CSR§2-8.3.c and 45CSR§2A-7.1.a.1]

4.4.10. Records of the visible emission observations shall be maintained documenting the date and time of each visible emission check, the name of the responsible observer, the results of the check, and if necessary, all corrective actions taken. The permittee shall maintain these records according to the conditions specified in 40 CFR 63.10(b)(1). Certified copies of these records shall be made available to the Director of the Division of Air Quality or his or her duly authorized representative upon request. If these records are considered to contain business confidential information as identified in the permit application, then the records may be submitted according to the procedures set forth in 45CSR31 - "Confidential Information."

4.4.11. **CISWI 111(d)/129.** The permittee shall maintain the following records for a period of at least 5 years:

a. Calendar date of each record.

b. Records of the data described in 4.4.11.b.i through 4.4.11.b.iv:

i. The CISWI unit charge dates, times, weights, and hourly charge rates.

ii. Liquor flow rate to the wet scrubber inlet every 15 minutes of operation.

iii. Pressure drop across the wet scrubber system every 15 minutes of operation.

iv. Liquor pH as introduced to the wet scrubber every 15 minutes of operation.

c. Identification of calendar dates and times for which monitoring systems used to monitor operating limits were inoperative, inactive, malfunctioning, or out of control (except for downtime associated with zero and span and other routine calibration checks). Identify the operating parameters not measured, the duration, reasons for not obtaining the data, and a description of corrective actions taken.

d. Identification of calendar dates, times, and durations of malfunctions, and a description of the malfunction and the corrective action taken.

e. Identification of calendar dates and times for which data show a deviation from the operating limits in 4.2.2 with a description of the deviations, reasons for such deviations, and a description of corrective actions taken.

f. The results of the initial, annual, and any subsequent performance tests conducted to determine compliance with the emission limits and/or establish operating limits, as applicable. Retain a copy of the complete test report including calculations.

g. Records showing the names of CISWI unit operators who have completed review of the information in 40 C.F.R. §60.2660(a) as required by §60.2660(b), including the date of the initial review and all subsequent annual reviews.

h. Records showing the names of the CISWI operators who have completed the operating training requirements under 40 C.F.R. §63.2635, met the criteria for qualification under §60.2645, and maintained or renewed their qualification under §60.2650 or §60.2655. Records must include documentation of training, the dates of the initial and refresher training, and the dates of their qualification and all subsequent renewals of such qualifications.

i. For each qualified operator, the phone and/or pager number at which they can be reached during operating hours.

j. Records of calibration of any monitoring devices as required under 4.2.2.

k. Equipment vendor specifications and related operation and maintenance requirements for the incinerator, emission controls, and monitoring equipment.

l. The information listed in 40 C.F.R. §60.2660(a).

m. On a daily basis, keep a log of the quantity of waste burned and the types of waste burned (always required).

All records must be available onsite in either paper copy or computer-readable format that can be printed upon request. **[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]**

4.4.12. **40 C.F.R. 63, Subpart EEEE.** For each storage tank subject to 40 C.F.R. 63, Subpart EEEE having a capacity of less than 18.9 cubic meters (5,000 gallons) and for each transfer rack subject to this subpart that only unloads organic liquids (i.e., no organic liquids are loaded at any of the transfer racks), you must keep documentation that verifies that each storage tank and transfer rack is not required to be controlled. The documentation must be kept up-to-date (i.e., all such emission sources at a facility are identified in the documentation regardless of when the documentation was last compiled) and must be in a form suitable and readily available for expeditious inspection and review according to 40 C.F.R. §63.10(b)(1), including records stored in electronic form in a separate location. The documentation may consist of identification of the tanks and transfer racks identified in 4.4.12 on a plant site plan or process and instrumentation diagram (P&ID). **[45CSR34; 40 C.F.R. §63.2343(a)]**

4.4.13. **40 C.F.R. 63, Subpart EEEE.** For each storage tank subject to 40 C.F.R. 63, Subpart EEEE having a capacity of 18.9 cubic meters (5,000 gallons) or more that is not subject to control based on the criteria specified in Table 2 of 40 C.F.R. 63, Subpart EEEE, items 1 through 6, you must

keep documentation, including a record of the annual average true vapor pressure of the total Table 1 organic HAP in the stored organic liquid, that verifies the storage tank is not required to be controlled under 40 C.F.R. 63, Subpart EEEE. The documentation must be kept up-to-date and must be in a form suitable and readily available for expeditious inspection and review according to 40 C.F.R. §63.10(b)(1), including records stored in electronic form in a separate location. *(T7AA)* **[45CSR34; 40 C.F.R. §§63.2343(b) and (b)(3)]**

4.4.14. **40 C.F.R. 63, Subpart EEEE.** For each transfer rack subject to 40 C.F.R. 63, Subpart EEEE that loads organic liquids but is not subject to control based on the criteria specified in Table 2 of 40 C.F.R. 63, Subpart EEEE, items 7 through 10, you must keep documentation, including the records specified in 40 C.F.R. §63.2390(d), that verifies the transfer rack is not required to be controlled under 40 C.F.R. 63, Subpart EEEE. The documentation must be kept up-to-date and must be in a form suitable and readily available for expeditious inspection and review according to 40 C.F.R. §63.10(b)(1), including records stored in electronic form in a separate location. **[45CSR34; 40 C.F.R. §§63.2343(c) and (c)(3)]**

4.4.15. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall maintain records in accordance with 40 C.F.R. §§63.9005, 63.9055, 63.9060, 63.9065; Table 7 to 40 C.F.R. 63, Subpart NNNNN; and 40 C.F.R. 63, Subpart A. **[45CSR34, 40 C.F.R. §§63.9005, 63.9055, 63.9060, 63.9065; Table 7 to 40 C.F.R. 63, Subpart NNNNN; 40 C.F.R. 63, Subpart A]**

4.4.16. **40 C.F.R. 63, Subpart FFFF.** The permittee shall maintain records in accordance with 40 C.F.R. §§63.2450, 63.2525, and 63.2540; Table 12 to 40 C.F.R. 63, Subpart FFFF; any records required by 40 C.F.R. 63, Subpart A, and as applicable in referenced 40 C.F.R. 63, Subparts F, G, H, SS, UU, WW, and GGG, and 40 C.F.R. 65, Subpart F. **[45CSR34; 40 C.F.R. §§63.2450, 63.2525, 63.2540; Table 12 to 40 C.F.R. 63, Subpart FFFF; 40 C.F.R. 63, Subparts A, F, G, H, SS, UU, WW, and GGG; 40 C.F.R. 65, Subpart F]**

4.5. Reporting Requirements

4.5.1. **CISWI 111(d)/129.** The permittee shall submit an annual report no more than 12 months following the previous report. The annual report must include the following items:

a. Company name and address.

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

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

d. The values for the operating limits established in 4.2.2.

e. If no deviation from any emission limitation or operating limit that applies has been reported, a statement that there was no deviation from the emission limitations or operating limits during the reporting period, and that no monitoring system used to determine compliance with the operating limits was inoperative, inactive, malfunctioning or out of control.

f. The highest recorded 3-hour average and the lowest recorded 3-hour average, as applicable, for each operating parameter recorded for the calendar year being reported.

g. Information recorded under 4.4.11.c through 4.4.11.e for the calendar year being reported.

h. If a performance test was conducted during the reporting period, the results of that test.

i. If you met the requirements of 40 C.F.R. §60.2720(a) or (b) as specified under 4.3.1, and did not conduct a performance test during the reporting period, you must state that you met the requirements of 40 C.F.R. §60.2720(a) or (b), and therefore, you were not required to conduct a performance test during the reporting period.

j. Documentation of all periods when all qualified CISWI unit operators were unavailable for more than 8 hours, but less than 2 weeks.

[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]

4.5.2. **CISWI 111(d)/129.** The permittee shall submit a deviation report if any recorded 3-hour average parameter level is above the maximum operating limit or below the minimum operating limit established under 4.2.2 or if a performance test was conducted that deviated from any emission limitation. The deviation report must be submitted by August 1 of that year for data collected during the first half of the calendar year (January 1 to June 30), and by February 1 of the following year for data collected during the second half of the calendar year (July 1 to December 31).

In each report, for any pollutant or parameter that deviated from the emission limitations or operating limits specified in 4.1.15 or 4.2.2, the permittee shall include the following:

a. The calendar dates and times the unit deviated from the emission limitations or operating limit requirements.

b. The averaged and recorded data for those dates.

c. Duration and causes of each deviation from the emission limitations or operating limits and the corrective actions.

d. A copy of the operating limit monitoring data during each deviation and any test report that documents the emission levels.

e. The dates, times, number, duration, and causes for monitoring downtime incidents (other than downtime associated with zero, span, and other routine calibration checks).

f. Whether each deviation occurred during a period of startup, shutdown, or malfunction, or during another period.

[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]

4.5.3. **CISWI 111(d)/129.** If all qualified operators are not accessible for 2 weeks or more, you must take the two actions in 4.5.3.a and 4.5.3.b.

a. Submit a notification of the deviation within 10 days that includes the three items in 4.5.3.a.i through 4.5.3.a.iii.

i. A statement of what caused the deviation.

ii. A description of what you are doing to ensure that a qualified operator is accessible.

iii. The date when you anticipate that a qualified operator will be available.

b. Submit a status report to the Administrator every 4 weeks that includes 4.5.3.b.i through 4.5.3.b.iii.

i. A description of what you are doing to ensure that a qualified operator is accessible.

ii. The date when you anticipate that a qualified operator will be accessible.

iii. Request approval from the Administrator to continue operation of the CISWI unit.

If the unit was shut down by the Administrator under the provision of 40 C.F.R. §60.2665(b)(2), due to a failure to provide an accessible qualified operator, you must notify the Administrator that you are resuming operation once a qualified operator is accessible.

[45CSR§18-7.3; 40 C.F.R. §§62.12155 through 62.12157]

4.5.4. **40 C.F.R. 63, Subpart EEEE.** If one or more of the events identified in paragraphs 4.5.4.a through 4.5.4.d occur since the filing of the Notification of Compliance Status or the last Compliance report, you must submit a subsequent Compliance report as specified in 4.4.13 and 4.4.14. The subsequent Compliance report shall be submitted according to the schedule in 40 C.F.R. §63.2386(b).

a. Any storage tank or transfer rack became subject to control under 40 C.F.R. 63, Subpart EEEE; or

b. Any storage tank equal to or greater than 18.9 cubic meters (5,000 gallons) became part of the affected source but is not subject to any of the emission limitations, operating limits, or work practice standards of 40 C.F.R. 63, Subpart EEEE.

c. Any transfer rack (except those racks at which only unloading of organic liquids occurs) became part of the affected source; or

d. Any of the information required in 40 C.F.R. §§63.2386(c)(1), (c)(2), or (c)(3) has changed.

[45CSR34; 40 C.F.R. §§63.2343(b)(2)(i), (c)(2)(i), and (d)]

4.5.5. **40 C.F.R. 63, Subpart NNNNN.** The permittee shall submit all required applicable reports and notifications per the requirements of 40 C.F.R. §§63.9005, 63.9050, and 63.9065; Tables 6 and 7 to 40 C.F.R. 63, Subpart NNNNN; and 40 C.F.R. 63, Subpart A. **[45CSR34; 40 C.F.R. §§63.9005, 63.9050, 63.9065; Tables 6 and 7 to 40 C.F.R. 63, Subpart NNNNN; 40 C.F.R. 63, Subpart A]**

4.5.6. **40 C.F.R. 63, Subpart FFFF.** The permittee shall submit all required applicable reports and notifications per the requirements of 40 C.F.R. §§63.2450, 63.2515, 63.2520, 63.2540; Tables 11 and 12 to 40 C.F.R. 63, Subpart FFFF; and 40 C.F.R. 63, Subpart A, and as applicable in referenced 40 C.F.R. 63, Subparts F, G, H, SS, UU, WW, and GGG, and 40 C.F.R. 65, Subpart F. **[45CSR34; 40 C.F.R. §§63.2450, 63.2515, 63.2520, 63.2540; Tables 11 and 12 to 40 C.F.R. 63, Subpart FFFF; 40 C.F.R. 63, Subparts A, F, G, H, SS, UU, WW, and GGG; 40 C.F.R. 65, Subpart F]**

ATTACHMENT A
Washington Works
Teflon Monomers Area
Recordkeeping for Process Emissions

Current Month:
Data entered by:
Date entered:
Reviewed by:
Date reviewed:

Equipment	Equip. ID	Emission Pt. ID	Monthly Parameters Max/hr	Total	Units
No. 6 Furnace - Process	T1CA	T1CAE			MM scf
No. 7 Furnace - Process	T1CB	T1CBE			MM scf
No. 8 Furnace - Process	T1CC	T1CCE			MM scf
No. 9 Furnace - Process	T1CD	T1CDE			MM scf
Cooler/Absorber Air Stripper	T2ES	T2ERE			lb 36% (wt) HCl
Emergency Generator	T7JJ	T7JJE			Hrs Operation
Column - Process Vent (Problems with C/A)	T2XM	T7XIE			hrs vented
Column - Process Vent (High Inerts)	T2XM	T7XIE			hrs vented
Primary Column - Condenser Operating Vents	T1XD	T7XIE			lbs vented
Distillate Storage Tanks - Process	T1BP-T	T7XIE			Tank vents
Brine Sent to T/C	T4GM	T7MIE			lbs
Brine System - Starting Inventory	T7AB	T7ABE	*		gal
Brine System - Ending Inventory	T7AB	T7ABE	*		gal
Brine System - Amount Added	T7AB	T7ABE	*		gal
Brine System - Amount Shipped in Waste	T7AB	T7ABE	*		gal
Brine System - Amount Spilled	T7AB	T7ABE	*		gal
Number of hours Cooler Absorber Vent went to NTFS	T2XH&T2XL	T2ERE	n/a		hrs/this month
Average Brine Storage Tank Vapor Pressure	T7AA	T7AAE		n/a	psia
MGH Vent Stack	T1GN	T1GNE			pph-VOC

Thermal Converter Feed Rates:

Equipment	Equip. ID	T/C Operating Max/hr	T/C not Operating Max/hr	Total		Max /hr Units
Recovery Column - Process - Thermal Con.	T4GM					lb OH
FP/D Autoclaves #8 & #9 (PFA only)	T6ID & T6IU			*	*	batches
PFA Autoclave (Aqueous) -Aborted Batches	C1FQ			*	*	batches
PFA Autoclave (Aqueous) -Normal Batches	C1FQ			*		batches
L3 Extruder Vent	C2ES	N/A		N/A	N/A	lb feed
Telomers Vent Accumulator	C3IZ					
Heels Column Process Vent	T4XK			**	**	lb OH
Heels Column Pot Vent	T4XK			**	**	lb feed
Portable Container Facility - Thermal Converter	T7EM			**	**	lb F23
Thermal Converter Combustion Emissions	T7IMC					MM scf

* These vent to the Mixed Gas Holder when the T/C is down.
** These streams are not vented when the T/C is down.

ATTACHMENT B
Washington Works
Teflon Monomers Area

Recordkeeping for Maintenance Emissions

Current Month:	
Data entered by:	
Date entered:	
Reviewed by:	
Date reviewed:	

Equipment	Equipment ID	Emission Pt. ID	Maintenance operation	Current Month No. of Events	Permit Frequency (per yr)[a]
Mixed Gas Holder	T1GN	T1GNE	Clear		2
Storage Tank & Vaporizer	T1LF	T2ERE T7XIE	Clear		2
Coolers - Press. Purge	T1DD-F	T7IME	Clear		156
Bag Filters - Press. Purge	T1DG&H	T7IME	Clear		16
Column & Piping - Press. Purge	T1XD	T7IME	Clear		3
Column - Maintenance - PP	T4GM	T7IME	Clear		3
Storage Tank - Thermal Converter	T4GO	T7IME	Clear		3
Storage Tanks - Maintenance	T1BP-T	T7XIE	Evacuate		9
Column - Evacuate Column	T4GS	T7XIE	Evacuate		3
Column - Detox/Dry	T4GS	T7XIE	Detox/dry Column		2
Storage Tank	T4GU, T4GV	T7XIE	Evacuate		10
Shipping Tank	T4GW	T7XIE	Evacuate		3
Shipping Tank	T4GX	T7XIE	Evacuate		3
Cylinder Loading	T4KA	T7XIE	Evacuate		600
Cylinder Loading	T4KA	T7XIE	Evacuate		250
Feed Tank	T4KB	T7XIE	Evacuate		3
Tank Truck Loading	T4KC	T7XIE	Evacuate		12
Tank Car Loading	T4KD	T7XIE	Evacuate		6

[a] This is the frequency that was assumed in calculation emission limits for the R13 permit.

ATTACHMENT C
Washington Works
Teflon Monomers Area
Recordkeeping for Control Devices

Current Month:	
Data entered by:	
Date entered:	
Reviewed by:	
Date reviewed:	

North Tank Farm Scrubber (T2ERC)	***Value***	***Units***
Minimum Liquor Flow		lb/hr
Maximum Scrubber Temperature		Deg C
Minimum Re-circulation Pump Current (or Minimum Liquor Flow and Maximum Scrubber Temperature)		amps
Thermal Converter - Combustion (T7IMC)	***Value***	***Units***
Minimum Combustion Chamber Temperature		Deg F
Maximum Waste Gas Feed Rate		lb/hr
Maximum Charge Rate (HFC-23 from tank car unloading for CISWI)		lb/hr
Thermal Converter - Scrubber (T7IMC)	***Value***	***Units***
Maximum Gas Stream Flow		pph
Minimum Pressure Drop Across the Wet Scrubber		in. wc
Minimum Re-circulated Liquor Flow (1st Stage)		gpm
Minimum Re-circulation Pump Current (1st Stage)		amps
Minimum Scrubber Liquor Flow (4th Stage) (Dilute Na_2SO_3, pH adjusted)		gpm
Liquor Oxidation/Reduction Potential (4th Stage)		Millivolts vs Ag/AgCl ref. electrode
Minimum Scrubber Liquor pH (4th Stage)		
Maximum Scrubber Effluent pH (4th Stage)		
Neutralization System Scrubber (T7JDC)	***Value***	***Units***
Scrubber Liquor Flow		gpm
Daily Confirmation of Blower Operation		
South Stillhouse Scrubber (T7XIC)	***Value***	***Units***
Maximum Scrubber Temperature		Deg F
Minimum Scrubber Liquor Circulation Rate		gpm
Maximum Vent Flow Discharge Rate		lb/hr HCl

ATTACHMENT D – Monthly Process Emissions

Emission Point Name	Emission Pt. ID	PRIORITY POLLUTANT		
		Max lb/hr	Limit	lb/month
Furnace	T1CAE			
Furnace	T1CBE			
Furnace	T1CCE			
Furnace	T1CDE			
Dryers	T1DBE			
Raw Material Unloading	T1JBE			
North Tank Farm Scrubber	T2ERE			
Trailer Loading	T2EXE			
Analyzer	T2EYE			
Storage Tank	T4GBE			
Cooling Tower	T7AKE			
Portable Container Facility	T7EME			
Thermal Converter Stack	T7IME			
Lime Silo	T7IOE			
Emergency Generator	T7JJE			
South Central Vent Stack	T7XIE			
MGH Vent Stack	T1GNE			
Total Monthly Process Emissions				

Emission Point Name	Emission Pt. ID	Monthly Process HAP Emissions		
		Max lb/hr	Limit	lb/month
North Tank Farm Scrubber	T2ERE			
Storage Tank	T4GBE			
Brine System Losses	T7XIE			
Portable Container Facility	T7EME			
Thermal Converter Stack - Process	T7IME			
Waste Acid Neutralization Tanks	T7JDE			
South Central Vent Stack - Process	T7XIE			
Total Monthly Process Emissions				

Monthly Maintenance Emissions

Emission Point Name	Emission Pt. ID	Monthly Maintenance Emissions (lb)		
		VOC	HCl	HF
Mixed Gas Holder	T1GNE			
No. 1 F22 Feed Pump	T1LHE			
No. 2 F22 Feed Pump	T1LIE			
North Tank Farm Scrubber	T2ERE			
Toluene Storage Tank	T4GBE			
Methanol Storage Tank	T4GCE			
Thermal Converter Stack	T7IME			
South Central Vent Stack	T7XIE			
Total Monthly Maintenance Emissions				

ATTACHMENT E - Annual Emissions

Annual Emissions - Running 12 Month Totals

Emission Point Name	Emission Pt. ID	Process VOC Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
No. 6 TFE Furnace - Combustion	T1CAE				
No. 7 TFE Furnace - Combustion	T1CBE				
No. 8 TFE Furnace - Combustion	T1CCE				
No. 9 TFE Furnace - Combustion	T1CDE				
MGH - Recycle Gas Dryers #1 &#2	T1DBE				
F22 Unloading	T1JBE				
North Tank Farm Scrubber	T2ERE				
TFE-CO2 Loading (Local)	T2EXE				
TFE-CO2 Analyzer	T2EYE				
T4 Area Storage Tank	T4GBE				
Portable Container Facility (Local)	T7EME				
Thermal Converter	T7IME				
Emergency Generator	T7JJE				
South Central Vent Stack	T7XIE				
MGH Vent Stack	T1GNE				
Total Process VOC Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process SO_2 Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
No. 6 TFE Furnace - Combustion	T1CAE				
No. 7 TFE Furnace - Combustion	T1CBE				
No. 8 TFE Furnace - Combustion	T1CCE				
No. 9 TFE Furnace - Combustion	T1CDE				
Thermal Converter	T7IME				
Emergency Generator	T7JJE				
Total Process SO_2 Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process NO_x Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
No. 6 TFE Furnace - Combustion	T1CAE				
No. 7 TFE Furnace - Combustion	T1CBE				
No. 8 TFE Furnace - Combustion	T1CCE				
No. 9 TFE Furnace - Combustion	T1CDE				
Thermal Converter	T7IME				
Emergency Generator	T7JJE				
Total Process NO_x Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process CO Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
No. 6 TFE Furnace - Combustion	T1CAE				
No. 7 TFE Furnace - Combustion	T1CBE				
No. 8 TFE Furnace - Combustion	T1CCE				
No. 9 TFE Furnace - Combustion	T1CDE				
Thermal Converter	T7IME				
Emergency Generator	T7JJE				
Total Process CO Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process PM_{10} Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
No. 6 TFE Furnace - Combustion	T1CAE				
No. 7 TFE Furnace - Combustion	T1CBE				
No. 8 TFE Furnace - Combustion	T1CCE				
No. 9 TFE Furnace - Combustion	T1CDE				
Cooling Tower	T7AKE				
Thermal Converter	T7IME				
Lime Silo	T7IOE				
Emergency Generator	T7JJE				
Total Process PM_{10} Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process HCl Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
North Tank Farm Scrubber	T2ERE				
Thermal Converter Stack	T7IME				
Neutralization System Scrubber	T7JDE				
South Central Vent Stack	T7XIE				
Total Process HCl Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process HF Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
Portable Container Facility	T7EME				
Thermal Converter Stack	T7IME				
Total Process HF Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process Methanol Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
South Central Vent Stack	T7XIE				
Total Process Methanol Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process Methylene Chloride Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
Brine System Losses	T7XIE				
Thermal Converter Stack	T7IME				
Total Process Methylene Chloride Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process Toluene Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
Storage Tank	T4GBE				
Thermal Converter Stack	T7IME				
Total Process Toluene Emissions (lb)					

Emission Point Name	Emission Pt. ID	Process APFO Emissions (lb)			
		Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
South Central Vent Stack	T7XIE				
Total Process APFO Emissions (lb)					

Pollutant	Total Maintenance Emissions (lb)			
	Month-Year -	Month-Year -	Month-Year -	Permit Limit (TPY)
VOC				
HCl				
HF				
Methanol				
Toluene				
Acetonitrile				

ATTACHMENT F - Furnace Log

Date	Furnace	Startup	Shutdown

No. 6 TFE Furnace - Process	T1CA
No. 7 TFE Furnace - Process	T1CB
No. 8 TFE Furnace - Process	T1CC
No. 9 TFE Furnace - Process	T1CD

ATTACHMENT G - Malfunction Log

Date	Equipment	Malfunction Cause	Duration	Corrective Action	Increased Emissions, lbs.	Preventing Future Occurrences

ATTACHMENT H - Odor Log

Date	Cause	Actions Taken

CERTIFICATION OF DATA ACCURACY

I, the undersigned, hereby certify that, based on information and belief formed after reasonable inquiry, all information contained in the attached _____, representing the period beginning _____ and ending _____, and any supporting documents appended hereto, is true, accurate, and complete.

Signature[1] (please use blue ink) _____ Responsible Official or Authorized Representative _____ Date

Name & Title (please print or type) _____ Name _____ Title

Telephone No. _____ Fax No. _____

[1] This form shall be signed by a "Responsible Official." "Responsible Official" means one of the following:

a. For a corporation: The president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit and either:

(i) the facilities employ more than 250 persons or have a gross annual sales or expenditures exceeding $25 million (in second quarter 1980 dollars), or

(ii) the delegation of authority to such representative is approved in advance by the Director;

b. For a partnership or sole proprietorship: a general partner or the proprietor, respectively;

c. For a municipality, State, Federal, or other public entity: either a principal executive officer or ranking elected official. For the purposes of this part, a principal executive officer of a Federal agency includes the chief executive officer having responsibility for the overall operations of a principal geographic unit of the agency (e.g., a Regional Administrator of U.S. EPA); or

d. The designated representative delegated with such authority and approved in advance by the Director.