



Louisville Metro Air Pollution Control District
850 Barret Avenue
Louisville, Kentucky 40204-1745



Permit No.: 36-96-C(R1)

Plant ID: 36

Effective Date: [Click here to enter a date.](#)

Expiration Date: [Click here to enter a date.](#)

Clariant Corporation (West Plant)
1227 South 12th Street
Louisville, KY 40201

is authorized to construct the described process equipment by the Louisville Metro Air Pollution Control District. Authorization is based on information provided with the application submitted by the company and in accordance with applicable regulations and the conditions specified herein.

Process equipment description:

Belt Calciner Process for nickel nitrate production, including the Emission Points on page 4. Permit revision R1 includes the addition of three HEPA filters.

Applicable Regulation(s): 2.03, 2.16, 5.00, 5.01, 5.14, 5.20, 5.21, 5.22, 5.23, 7.08, and 40 CFR 63 Subpart VVVVVV

Control reference(s): N/A

Application No. 67821

Application Received: 10/30/2014

Permit Writer: Virginia Rhodes

{manager1}
Air Pollution Control Officer
{date1}

This permit covers only the provisions of Kentucky Revised Statutes Chapter 77 Air Pollution Control, the regulations of the Louisville Metro Air Pollution Control District (District) and, where appropriate, certain federal regulations. The issuance of this permit does not exempt any owner or operator to whom it has been issued from prosecution on account of the emission or issuance of any air contaminant caused or permitted by such owner or operator in violation of any of the provisions of KRS 77 or District regulations. Any permit shall be considered invalid if timely payment of applicable fees is not made after receipt of the statement of fees (SOF). The permit contains general permit conditions and specific permit conditions. General conditions are applicable unless a more stringent requirement is specified elsewhere in the permit.

General Conditions

- G1. The owner or operator of the affected facility covered by this permit shall notify the District of any process change, equipment change, material change, or change in method or hours of operation. This requirement is applicable to those changes that may have the potential for increasing the emission of air contaminants to a level in excess of the applicable limits or standards specified in this permit or District regulations.
- G2. The owner or operator shall obtain new or revised permits from the District when: (See [District Regulation 2.16](#) for Title V sources. See [District Regulation 2.17](#) for FEDOOP sources. See [District Regulation 2.03](#) for other sources.)
- a. The company relocates to a different physical address.
 - b. The ownership of the company is changed.
 - c. The name of the company as shown on the permit is changed.
 - d. Permits are nearing expiration or have expired.
- G3. The owner or operator shall submit a timely application for changes according to G2. For minor sources only, the District does not require application for permit renewal. The District automatically commences the process of permit renewal for minor sources upon expiration. Timely renewal is not always achievable; therefore, the company is hereby authorized to continue operation in compliance with the latest District permit(s) until the District issues the renewed permit(s).
- G4. The owner or operator shall not be authorized to transfer ownership or responsibility of the permit. The District may transfer permits after appropriate notification (Form AP-100A) has been received and review has been made.
- G5. The owner or operator shall pay the required permit fees within 45 days after issuance of the SOF by the District, unless other arrangements have been proposed and accepted by the District.
- G6. This permit allows operation 8,760 hours per year unless specifically limited elsewhere in this permit.

- G7. The owner or operator shall submit emission inventory reports as required by [Regulation 1.06](#).
- G8. The owner or operator shall timely report abnormal conditions or operational changes, which may cause excess emissions as required by [Regulation 1.07](#).
- G9. Unless specified elsewhere in this permit, the owner or operator shall complete required monthly record keeping within 30 days following the end of each calendar month.
- G10. If a change in the Responsible Official (RO) occurs during the term of this permit, the owner or operator shall provide written notification (Form AP-100A) to the District within 30 calendar days of the date the RO change occurs.

Existing Equipment					
Emission Point ID	Description	Date Installed	Applicable Regulation(s)	Control ID	Stack ID
W53 Reforming Catalysts					
DD-220-W53-006	Drum Dumper	4/1/1996	7.08, 5.01, 5.20, 5.21, 5.23 40 CFR 63 VVVVVV	DC-220-W53-006 FIL-220-W53-008 ¹	S-220-W53-03
H-220-W53-011	Hopper	4/1/1996			
FD-220-W53-005	Feeder	4/1/1996			
BE-220-W53-001	Belt Elevator	4/1/1996			
FD-220-W53-020	Feeder	4/1/1996			
SL-220-W53-012	Soft Loader	4/1/1996			
H-220-W53-012	Hopper	4/1/1996			
SL-220-W53-013	Soft Loader	4/1/1996			
H-220-W53-013	Hopper	4/1/1996			
CV-220-W53-002	Conveyor	4/1/1996			
CV-220-W53-003	Conveyor	4/1/1996			
CV-220-W53-005	Conveyor	4/1/1996			
VS-220-W53-003	Screener	4/1/1996			
FD-220-W53-019	Feeder	4/1/1996			
HT-220-W53-002	Calciner (3.0 MMBTU/hr Natural Gas)	4/1/1996		Parallel ED-220-W52-004 Through 007 ^{2,3} in series with ED-220-W52-008, SC-220-W52-001, & V-220-W52-002	S-220-W52-11
				DC-220-W53-003 ³ in series with FIL-220-W53-006 ¹	S-220-W53-05
				DC-220-W53-004 ³ in series with FIL-220-W53-007 ¹	S-220-W53-06
VS-220-W53-004	Screener	4/1/1996	DC-220-W53-004 FIL-220-W53-007 ¹	S-220-W53-06	
H-220-W53-016	Hopper	4/1/1996			
FD-220-W53-007	Feeder	4/1/1996			
SSD/ SL-220-W53-003	Super Sack Drum Loader	4/1/1996			
BE-220-W53-002	Belt Elevator	4/1/1996			

¹ The HEPA filters will be located in series after the dust collectors.

² ED-220-W52-004 through 007 are in parallel flow.

³ There are three pick-up points for Calciner HT-220-W53-002. Parallel ED-220-W52-004 through 007 in series with ED-220-W52-00, SC-220-W52-00, & V-220-W52-002 is the first pick-up point, DC 220-W53-003 in series with FIL-220-W53-006 is the second pick-up point, DC-220-W53-004 in series with FIL-220-W53-007 is the third pick-up point. Each pick-up point controls emissions from different areas of the calciner.

New Control Devices				
Control ID	Description	Performance Indicator	Control Efficiency	Stack ID
FIL-220-W53-006	HEPA filter	1.5 – 3 in w.c.	99.97% PM	S-220-W53-05
FIL-220-W53-007	HEPA filter	1.5 – 3 in w.c.	99.97% PM	S-220-W53-06
FIL-220-W53-008	HEPA filter	1.5 – 3 in w.c.	99.97% PM	S-220-W53-03
Existing Control Devices				
DC-220-W53-003	Baghouse, Flex-Kleen, Model 226-CDCC-4-3-24	1.0 – 5.0 " w.c.	99.786% PM 75% NO _x	S-220-W53-005
DC-220-W53-004	Baghouse, Flex-Kleen, Model 226-CDCC-3-2-12		99.786% PM 75% NO _x	S-220-W53-006
DC-220-W53-006	Baghouse, Flex-Kleen, Model 226-CDCC-3-2-12		99.786%	S-220-W53-003
ED-220-W52-004	Eductor, Schutte & Koerting, Model 7014 L 8	Pressure Drop > 60 psi	75% NO _x (Parallel Flow)	S-220-W52-011
ED-220-W52-005	Eductor, Schutte & Koerting, Model 7014 L 8			
ED-220-W52-006	Eductor, Schutte & Koerting, Model 7014 L 8			
ED-220-W52-007	Eductor, Schutte & Koerting, Model 7014 L 8			
ED-220-W52-008	Eductor, Schutte & Koerting, Model 7014 L 8, 1996	Pressure Drop > 40 psi	95% PM, 75% NO _x & Ammonia	
SC-220-W52-001	Impingement Plate Scrubber, W. W. Sly, Model 330, 1996	Pressure Drop > 7 psi	95% PM 75% NO _x & Ammonia	
V-220-W52-002	Packed Tower Scrubber #2, Croll Reynolds, Model 72T-10NOX	Pressure Drop > 10 psi	75% NO _x	

Specific Conditions

S1. Standards (Regulation 2.03, section 6.1)

a. **PM/PM₁₀/PM_{2.5}**

- i. The owner or operator shall not allow or cause the plant-wide PM/PM₁₀/PM_{2.5} emissions to equal or exceed 100 tons during any consecutive 12-month period. (Regulations 2.04 and 2.05)⁴
- ii. For each piece of equipment subject to Regulation 7.08, the owner or operator shall not allow or cause PM emissions to exceed 2.81 lb/hr based on actual operating hours in a calendar day.⁵ (Regulation 7.08, section 3.1.2)

b. **Opacity**

The owner or operator shall not allow or cause visible emissions to equal or exceed twenty percent (20%) opacity. (Regulation 7.08, section 3.1.1)

c. **NO_x**

- i. The owner or operator shall not allow or cause the plant-wide NO_x emissions to equal or exceed 100 tons during any consecutive 12-month period. (Regulations 2.04 and 2.05)⁴
- ii. From HT-220-W53-002, the owner or operator shall not allow or cause the emissions of NO_x to exceed 300 ppm by volume, expressed as NO₂. (Regulation 7.08, section 4.1)⁶
- iii. For Eductors ED-200-W53-004 through ED-200-W52-007, Eductor ED-220-W52-008, Plate Scrubber SC-220-W52-001, and Packed Tower Scrubber #2 V-220-W52-002, the owner or operator shall, to the extent practicable, operate and maintain the control devices at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions.

d. **HAP**

- i. The owner or operator shall not allow or cause the plant-wide emissions of any single HAP to equal or exceed 10 tons during any consecutive 12-month period. (Regulation 2.05)

⁴ This project is not major for PSD/NSR since the Company has already accepted synthetic minor limits.

⁵ The potential PM emissions from all emission points in this Emission Unit subject to Regulation 7.08 cannot exceed the standard uncontrolled.

⁶ The potential NO_x emissions from HT-220-W53-002 cannot exceed the standard controlled.

- ii. The owner or operator shall not allow or cause the plant-wide total HAP emissions to equal or exceed 25 tons during any consecutive 12-month period. (Regulation 2.05)
- iii. *Management Practices.* The owner or operator shall comply with the following paragraphs. (40 CFR 63 Subpart VVVVVV)
 - 1) Each process vessel must be equipped with a cover or lid that must be closed at all times when it is in metal HAP service, except for manual operations that require access, such as material addition and removal, inspection, sampling and cleaning. This requirement does not apply to process vessels containing only metal HAP that are in a liquid solution or other form that will not result in particulate emissions of metal HAP (e.g., metal HAP that is in ingot, paste, slurry, or moist pellet form or other form). (40 CFR 63.11495(a)(1))
 - 2) The owner or operator must conduct inspections of process vessels and equipment for each CMPU in metal HAP service, as specified in the following paragraphs to demonstrate compliance with S1.c.iii.1) and to determine that the process vessels and equipment are sound and free of leaks. (40 CFR 63.11495(a)(3))
 - a) Inspections must be conducted at least quarterly. (§63.11495(a)(3)(i))
 - b) For these inspections, detection methods incorporating sight, sound, or smell are acceptable. Indications of a leak identified using such methods constitute a leak unless you demonstrate that the indications of a leak are due to a condition other than loss of HAP. If indications of a leak are determined not to be HAP in one quarterly monitoring period, you must still perform the inspection and demonstration in the next quarterly monitoring period. (§63.11495(a)(3)(ii))
 - c) Inspections must be conducted while the subject CMPU is operating. (§63.11495(a)(3)(iv))
 - d) No inspection is required in a calendar quarter during which the subject CMPU does not operate for the entire calendar quarter and is not in organic HAP service or metal HAP service. If the CMPU operates at all during a calendar quarter, an inspection is required. (§63.11495(a)(3)(v))
 - 3) The owner or operator must repair any leak within 15 calendar days after detection of the leak, or document the reason for any delay of repair. For the purposes of this paragraph, a leak will be

considered “repaired” if a condition specified in one of the following paragraphs is met. (40 CFR 63.11495(a)(4))

- a) The visual, audible, olfactory, or other indications of a leak to the atmosphere have been eliminated, or (§63.11495(a)(4)(i))
 - b) No bubbles are observed at potential leak sites during a leak check using soap solution, or (§63.11495(a)(4)(ii))
 - c) The system will hold a test pressure. (§63.11495(a)(4)(iii))
- 4) The owner or operator must keep records of the dates and results of each inspection event, the dates of equipment repairs, and, if applicable, the reasons for any delay in repair. (40 CFR 63.11495(a)(5))
- iv. Startup, shutdown, and malfunction (SSM) provisions in subparts that are referenced in 40 CFR 63.11495(a) and (b) do not apply. (40 CFR 63.11495(c))
 - v. *General duty.* At all times, the owner or operator must operate and maintain any affected CMPU, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Administrator, which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the CMPU. (40 CFR 63.11495(d))
 - vi. *Emissions from metal HAP process vents.* For all metal HAP process vents from each CMPU with collective uncontrolled metal HAP emissions equal to or greater than 400 lb/yr, the owner or operator shall reduce collective uncontrolled emissions of total metal HAP emissions by ≥ 95 percent by weight by routing emissions from a sufficient number of the metal process vents through a closed-vent system to any combination of control devices, according to the requirements of §63.11496(f)(3). The requirements of this paragraph §63.11495(f) do not apply to metal HAP process vents from CMPU containing only metal HAP that are in a liquid solution or other form that will not result in particulate emissions of metal HAP (e.g., metal HAP that is in ingot, paste, slurry, or moist pellet form or other form). (40 CFR 63.11495(f) and Table 4)
- e. **TAC**
- i. The owner or operator shall not allow emissions of any TAC to exceed environmentally acceptable (EA) levels, whether specifically established

by modeling or determined by the District to be *de minimis*. (Regulations 5.00 and 5.21)⁷

- ii. For each emission point subject to Regulation 5.21, the owner or operator shall operate and maintain the control devices at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. (Regulations 5.00 and 5.21)⁸

S2. Monitoring and Record Keeping (Regulation 2.03, section 6.1)

a. PM/PM₁₀/PM_{2.5}

- i. For each PM emission point, the owner or operator shall monitor and maintain records of the throughput of each raw material during each calendar month.
- ii. The owner or operator shall calculate and record the plant-wide consecutive 12-month PM/PM₁₀/PM_{2.5} emissions for each month in the reporting period.

b. Opacity

- i. For each referenced PM emission point, the owner or operator shall conduct a monthly one-minute visible emissions survey during normal process operation of each PM emission point. No more than four emission points shall be observed simultaneously. The opacity surveys can be performed on the building exhaust points if the process is wholly within a building.
- ii. At emission points where visible emissions are observed, the owner or operator shall initiate corrective action within eight hours of the initial observation. If the visible emissions persist, the owner or operator shall perform or cause to be performed a Method 9 within 24 hours of the initial observation.
- iii. The owner or operator shall maintain monthly records of the results of all visible emissions surveys and Method 9 tests performed. The records shall

⁷ The potential Chromium Trivalent and Compounds from each piece of equipment cannot exceed the de minimis levels uncontrolled. As of the effective date of this permit, the de minimis levels of Cobalt and Cobalt Compounds are 0.00022 pound per averaging period and 0.00022 pounds per hour based on an 8 hour averaging period; Copper and Copper Compounds are 0.0400 pounds per averaging period and 0.0400 pounds per hour based on an 8 hour averaging period; Manganese and Manganese Compounds are 24.00 pound per averaging period, and 0.027 pounds per hour based on an annual averaging period; and Nickel and Nickel compounds are 1.82 pound per averaging period and 0.0021 pounds per hour based on an annual averaging period.

⁸ For emission points subject to Regulation 5.21, the potential Cobalt and Cobalt Compound emissions, Copper and Copper Compound emissions, Manganese and Manganese Compound emission, and Nickel and Nickel Compound emissions cannot exceed de minimis levels controlled.

include the date of each survey, the name of the person conducting the survey, whether or not visible emissions were observed, and what if any corrective action was performed. If an emission point is not being operated during a given month, then no visible emission survey needs to be performed and a negative declaration shall be entered in the record.

c. **NO_x**

- i. The owner or operator shall calculate and record the plant-wide consecutive 12-month NO_x emissions for each month in the reporting period.
- ii. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of ED-220-W52-004, ED-220-W52-005, ED-220-W52-006, ED-220-W52-007, ED-220-W52-008, SC-220-W52-001, and V-220-W52-002 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- iii. The owner or operator shall maintain the following records for ED-220-W52-004, ED-220-W52-005, ED-220-W52-006, ED-220-W52-007, ED-220-W52-008, SC-220-W52-001 and V-220-W52-002:
 - 1) Maintain daily records of the pressure drop across ED-200-W52-004 through ED-200-W52-007 to ensure it is greater than 60 psi;
 - 2) Maintain daily records of the pressure drop across ED-200-W52-008 to ensure it is greater than 40 psi;
 - 3) Maintain daily records of the pressure drop across SC-220-W52-001 to ensure it is greater than 7 psi;
 - 4) Maintain daily records of the pressure drop across V-220-W54-101 to ensure it is greater than 10 psi;
 - 5) Record any parameter excursions, corrective actions taken, and measures implemented to prevent reoccurrence.
- iv. For HT-220-W53-002, for any period of time when the process was operating and a NO_x control device was not operating, the owner or operator shall maintain the following records:
 - 1) The duration of the control device downtime;
 - 2) The process throughput during the control device downtime;
 - 3) The emissions of NO_x (tons/year), and NO_x (ppmv); and

- 4) Summary information on the cause of the event, corrective action taken, and measures implemented to prevent recurrence.
- 5) A negative declaration if no bypasses occurred.

d. **HAP**

- i. For each HAP emission point, the owner or operator shall calculate and monthly record the monthly throughput of each HAP-containing raw material and the HAP content.
- ii. The owner or operator shall calculate and record the *plant-wide* consecutive 12-month emissions of each single HAP and total HAP for each month in the reporting period.
- iii. The owner or operator must determine the sum of metal HAP emissions from all metal HAP process vents within a CMPU subject to 40 CFR 63 Subpart VVVVVV, except you are not required to determine the annual emissions if you control the metal HAP process vents within a CMPU in accordance with Table 4 of Subpart VVVVVV or if you determine your total metal HAP usage in the process unit is less than 400 lb/yr. To determine the mass emission rate you may use process knowledge, engineering assessment, or test data. You must keep records of the emissions calculations. (40 CFR 63.11495(f)(1))
- iv. If your current estimate is that total uncontrolled metal HAP emissions from a CMPU subject to this subpart are less than 400 lb/yr, then you must keep records of either the number of batches operated per month (batch vents) or the process operating hours (continuous vents). Also, you must reevaluate your total emissions before you make any process or operational change that affects emissions of metal HAP. If projected emissions increase to 400 lb/yr or more, then you must be in compliance with one of the options for metal HAP process vents in Table 4 of Subpart VVVVVV upon initiating operation under the new operating conditions. You must keep records of all recalculated emissions determinations. (40 CFR 63.11495(f)(2))
- v. For an existing source subject to the HAP metals emission limits specified in Table 4 of Subpart VVVVVV, the owner or operator must prepare a monitoring plan containing the information in the following paragraphs. The plan must be maintained on-site and be available on request. You must operate and maintain the control device according to a site-specific monitoring plan at all times. You must keep records of monitoring results to demonstrate continuous compliance. (40 CFR 63.11495(f)(3)(i))
 - 1) A description of the device;

- 2) Results of a performance test or engineering assessment conducted in accordance with § 63.11495(f)(3)(ii) verifying the performance of the device for reducing HAP metals or particulate matter (PM) to the levels required by this subpart;
 - 3) Operation and maintenance plan for the control device (including a preventative maintenance schedule consistent with the manufacturer's instructions for routine and long-term maintenance) and continuous monitoring system (CMS).
 - 4) A list of operating parameters that will be monitored to maintain continuous compliance with the applicable emissions limits; and
 - 5) Operating parameter limits based on either monitoring data collected during the performance test or established in the engineering assessment.
- vi. *Recordkeeping.* The owner or operator must maintain files of all information required by this subpart for at least 5 years following the date of each occurrence according to the requirements in §63.10(b)(1). If you are subject, you must comply with the recordkeeping and reporting requirements of §63.10(b)(2)(iii) and (vi) through (xiv), and the following applicable requirements for each CMPU subject to this Subpart VVVVVV. (40 CFR 63.11501(c)(1))
- 1) Records of management practice inspections, repairs, and reasons for any delay of repair, as specified in §63.11495(a)(5). (§63.11501(c)(1)(i))
 - 2) Records of small heat exchange system inspections, demonstrations of indications of leaks that do not constitute leaks, repairs, and reasons for any delay in repair as specified in §63.11495(b). (§63.11501(c)(1)(ii))
 - 3) Records of metal HAP emission calculations as specified in §63.11496(f)(1) and (2). If total uncontrolled metal HAP process vent emissions from a CMPU subject to this subpart are estimated to be less than 400 lb/yr, also keep records of either the number of batches per month or operating hours, as specified in §63.11496(f)(2). (§63.11501(c)(1)(v))
 - 4) Records of the date, time, and duration of each malfunction of operation of process equipment, control devices, recovery devices, or continuous monitoring systems used to comply with this subpart that causes a failure to meet a standard. The record must include a list of the affected sources or equipment, an estimate of the volume of each regulated pollutant emitted over the standard, and a

description of the method used to estimate the emissions. (§63.11501(c)(1)(vii))

- 5) Records of actions taken during periods of malfunction to minimize emissions in accordance with §63.11495(d), including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation. (§63.11501(c)(1)(viii))

e. TAC

- i. The owner or operator shall maintain records sufficient to demonstrate environmental acceptability, including, but not limited to MSDS, analysis of emissions, and/or modeling results.
- ii. The owner or operator shall re-evaluate the environmental acceptability and document the environmentally acceptable emissions if a new TAC is introduced or the content of a TAC in a raw material increases above *de minimis*.
- iii. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of FIL-220-W53-006, FIL-220-W53-007, FIL-220-W53-008, DC-220-W53-003, DC-220-W53-004, DC-220-W53-006, ED-220-W52-008, and SC-220-W52-001 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- iv. The owner or operator shall maintain the following records for FIL-220-W53-006, FIL-220-W53-007, FIL-220-W53-008, DC-220-W53-003, DC-220-W53-004, DC-220-W53-006, ED-220-W52-008, and SC-220-W52-001:
 - 1) Maintain daily records of the pressure drop to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop
FIL-220-W53-006, FIL-220-W53-007, FIL-220-W53-008	1.5 – 3 inches water column
DC-220-W53-003, DC-220-W53-004, DC-220-W53-006	1 – 5.0 inches water column

- 2) Record any parameter excursions, corrective actions taken, and measures implemented to prevent reoccurrence.
- v. The pressure drop range for FIL-220-W53-006, FIL-220-W53-007, or FIL-220-W53-008 can be modified through performance testing.

- vi. See S2.c.iii.
- vii. For emission points subject to Regulation 5.21, for any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records¹²:
 - 1) The duration of the control device downtime;
 - 2) The process throughput during the control device downtime;
 - 3) The emissions of TAC (lb/hr), TAC (lb/averaging period), and TAC (tons/year); and
 - 4) A statement if the event did or did not impact the environmental acceptability demonstration.
 - 5) Summary information on the cause of the event, corrective action taken, and measures implemented to prevent reoccurrence.
 - 6) A negative declaration if no bypasses occurred.

S3. Reporting (Regulation 2.03, section 6.1)

The owner or operator shall submit the compliance reports that include the information in these sections. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement. Duplicative reporting is not required. For example, information required to be submitted in Periodic Reports required by a MACT is not required to also be reported in the semiannual reports. If no deviations occur in the reporting period, the owner or operator shall report a negative declaration in the appropriate report. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11.

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete.”
- Signature and title of the responsible official of the company.

The semi-annual compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 - June 30	August 29
July 1 - December 31	March 1 of the following year

a. **PM/PM₁₀/PM_{2.5}**

The owner or operator shall report the plant-wide consecutive 12-month PM/PM₁₀/PM_{2.5} emissions for each month in the reporting period.

b. Opacity

- i. The date and time of each VE Survey where visible emissions were observed and the results of the Method 9 test performed;
- ii. Identification of all periods of exceeding the opacity standard;
- iii. Description of any corrective action taken for each exceedance of an opacity standard specified in this permit; and
- iv. Any deviation from the requirement to perform or record the results of the required monthly VE surveys or Method 9 tests.
- v. If there were no deviations during the report period, report a negative declaration.

a. NO_x

- i. The owner or operator shall report the plant-wide consecutive 12-month emissions of all air pollutants for each month in the reporting period.
- ii. For HT-220-W53-002, identification of all periods when a process was operating and an associated control device was not operating, including the information in S2.c.iv., or a negative declaration if the control device was operating at all times the process was operating during the reporting period.
- iii. For ED-220-W52-004, ED-220-W52-005, ED-220-W52-006, ED-220-W52-007, ED-220-W52-008, SC-220-W52-SC-001, and V-220-W52-002, the owner or operator shall report the following:
 - 1) Any excursions of the pressure drop range.
 - 2) Any corrective actions taken for any excursions of the pressure drop range.
 - 3) Report a negative declaration if no deviations occurred during the report period.

b. HAP

- i. The owner or operator shall report the consecutive 12-month plant-wide emissions of each individual HAP for each month in the reporting period.
- ii. The owner or operator shall report the consecutive 12-month plant-wide emissions of total HAP for each month in the reporting period.
- iii. *Semiannual Compliance Reports.* The owner or operator must submit semiannual compliance reports that contain the information specified in

the following paragraphs, as applicable. Reports are required only for semiannual periods during which you experienced any of the events described in § 63.11501(d)(1) through (8). (40 CFR 63.11501(d))

- 1) *Deviations.* You must clearly identify any deviation from the requirements of this subpart. (§63.11501(d)(1))
- 2) *Delay of leak repair.* You must provide the following information for each delay of leak repair beyond 15 days for any process equipment, storage tank, surge control vessel, bottoms receiver, and each delay of leak repair beyond 45 days for any heat exchange system with a cooling water flow rate less than 8,000 gal/min: information on the date the leak was identified, the reason for the delay in repair, and the date the leak was repaired. (§63.11501(d)(3))
- 3) *Process change.* You must report each process change that affects a compliance determination and submit a new certification of compliance with the applicable requirements in accordance with the procedures specified in §63.11501(b). (§63.11501(d)(4))
- 4) *Overlapping rule requirements.* Report any changes in the overlapping provisions with which you comply. (§63.11501(d)(6))
- 5) *Malfunctions.* If a malfunction occurred during the reporting period, the report must include the number of instances of malfunctions that caused emissions in excess of a standard. For each malfunction that caused emissions in excess of a standard, the report must include a list of the affected sources or equipment, an estimate of the volume of each regulated pollutant emitted over the standard, and a description of the method used to estimate the emissions. The report must also include a description of actions you took during a malfunction of an affected source to minimize emissions in accordance with §63.11495(d), including actions taken to correct a malfunction. (§63.11501(d)(8))

c. **TAC**

- i. The owner or operator shall report any failure to perform the visual inspection of the structural and mechanical integrity.
- ii. For all emission points subject to Regulation 5.21, identification of all periods when a process was operating and an associated control device was not operating, including the information in S2.e.vii. or a negative declaration if the control device was operating at all times the process was operating during the reporting period.

- iii. For FIL-220-W53-006, FIL-220-W53-007, FIL-220-W53-008, DC-220-W53-003, DC-220-W53-004, DC-220-W53-006, ED-220-W52-008, and SC-220-W52-001, the owner or operator shall report the following:
 - 1) Any excursions of the pressure drop range.
 - 2) Any corrective actions taken for any excursions of the pressure drop range.
 - 3) Report a negative declaration if no deviations occurred during the report period.
- iv. Within 6 months after a change of a raw material, the owner or operator shall submit the re-evaluated EA demonstration to the District.
- v. The owner or operator shall report any conditions that were inconsistent with those conditions analyzed in the most recent Environmental Acceptability Demonstration or a negative declaration stating that operations were within the conditions analyzed. This includes, but is not limited to, control device upset conditions.
- vi. For any conditions outside the analysis, the owner or operator shall re-analyze to determine whether these conditions comply with the STAR program. Changes to the air dispersion modeling program or meteorological data used in the most recent Environmental Acceptability Demonstration do not trigger the requirement to re-analyze. (Regulations 5.00 and 5.21, sections 4.22 – 4.24)

S4. Testing (Regulation 2.03, section 5.1)

a. **PM/PM₁₀/PM_{2.5}**

There are no testing requirements for this pollutant.

b. **Opacity**

c. **There are no testing requirements for this pollutant. NO_x**

There are no testing requirements for this pollutant.

d. **HAP**

For an existing source subject to the HAP metals emission limits specified in Table 4 of Subpart VVVVVV, you must comply with the initial compliance and monitoring requirements in §63.11496(f)(3)(i) through (iii). You must keep records of monitoring results to demonstrate continuous compliance. (40 CFR 63.11496(f)(3))

- i. You must prepare a monitoring plan containing the information in §63.11496(f)(3)(i)(A) through (E). The plan must be maintained on-site and be available on request. You must operate and maintain the control device according to a site-specific monitoring plan at all times. (40 CFR 63.11496(f)(3)(i))
 - 1) A description of the device;
 - 2) Results of a performance test or engineering assessment conducted in accordance with S4.b.ii. verifying the performance of the device for reducing HAP metals or particulate matter (PM) to the levels required by this subpart;
 - 3) Operation and maintenance plan for the control device (including a preventative maintenance schedule consistent with the manufacturer's instructions for routine and long-term maintenance) and continuous monitoring system (CMS).
 - 4) A list of operating parameters that will be monitored to maintain continuous compliance with the applicable emissions limits; and
 - 5) Operating parameter limits based on either monitoring data collected during the performance test or established in the engineering assessment.
- ii. You must conduct a performance test or an engineering assessment for each CMPU subject to a HAP metals emissions limit in Table 4 to this subpart and report the results in your Notification of Compliance Status (NOCS). Each performance test or engineering assessment must be conducted under representative operating conditions, and sampling for each performance test must be conducted at both the inlet and outlet of the control device. Upon request, you shall make available to the Administrator such records as may be necessary to determine the conditions of performance tests. If you own or operate an existing affected source, you are not required to conduct a performance test if a prior performance test was conducted within the 5 years prior to the effective date using the same methods specified in S4.b.iii., and, either no process changes have been made since the test, or, if you can demonstrate that the results of the performance test, with or without adjustments, reliably demonstrate compliance despite process changes. (40 CFR 63.11496(f)(3)(ii))
- iii. If you elect to conduct a performance test, it must be conducted according to requirements in §63.11410(j)(1). As an alternative to conducting a performance test using Method 5 or 5D to determine the concentration of PM, you may use Method 29 in 40 CFR 60, appendix A-8 to determine the concentration of HAP metals. You have demonstrated initial compliance if

the overall reduction of either HAP metals or total PM is equal to or greater than 95 percent. (40 CFR 63.11496(f)(3)(iii))

e. **TAC**

There are no testing requirements for TACs.

Comments

1. The construction permit fees are based on the construction fee for Title V source (\$2,542.40) and *de minimis* TACs review (\$508.48).
2. The level of controls needed to meet the TAC *de minimis* levels in Regulation 5.21 are listed in the table below (1st indicates first control device needed, etc.). The starred (*) emission units can meet the *de minimis* values without a control device.

Emission Point	Chromium III	Cobalt	Copper	Manganese	Nickel
	& Compounds				
W53 – Reforming Catalysts					
DD-220-W53-006	*	2 nd	1 st	1 st	2 nd
H-220-W53-011	*	2 nd	1 st	1 st	2 nd
FD-220-W53-005	*	2 nd	1 st	1 st	2 nd
BE-220-W53-001	*	2 nd	1 st	1 st	2 nd
FD-220-W53-020	*	2 nd	1 st	1 st	2 nd
SL-220-W53-012	*	2 nd	1 st	1 st	2 nd
H-220-W53-012	*	2 nd	1 st	1 st	2 nd
SL-220-W53-013	*	2 nd	1 st	1 st	2 nd
H-220-W53-013	*	2 nd	1 st	1 st	2 nd
CV-220-W53-002	*	2 nd	1 st	1 st	2 nd
CV-220-W53-003	*	2 nd	1 st	1 st	2 nd
CV-220-W53-005	*	2 nd	1 st	1 st	2 nd
VS-220-W53-003	*	2 nd	1 st	1 st	2 nd
FD-220-W53-019	*	2 nd	1 st	1 st	2 nd
HT-220-W53-002	*	2 nd	1 st	1 st	1 st
VS-220-W53-004	*	2 nd	1 st	1 st	1 st
H-220-W53-016	*	2 nd	1 st	1 st	2 nd
FD-220-W53-007	*	2 nd	1 st	1 st	2 nd
SSD/SL-220-W53-003	*	2 nd	1 st	1 st	1 st
BE-220-W53-002	*	2 nd	1 st	1 st	1 st

3.