

Facility DEC ID: 5154800008

PERMIT Under the Environmental Conservation Law (ECL)

IDENTIFICATION INFORMATION

Permit Type: Air Title V Facility

Permit ID: 5-1548-00008/00081

Effective Date: 03/19/2012 Expiration Date: 03/18/2017

Permit Issued To:INTERNATIONAL PAPER CO

6400 POPLAR AVE MEMPHIS, TN 38197

Contact:

KIRK CARLSON

INTERNATIONAL PAPER MILL MANAGER

568 SHORE AIRPORT RD TICONDEROGA, NY 12883

(518) 585-5300

Facility:

INTERNATIONAL PAPER TICONDEROGA MILL

568 SHORE AIRPORT RD TICONDEROGA, NY 12883

Contact:

DEAN MESSNER

INTERNATIONAL PAPER TICONDEROGA MILL

568 SHORE AIRPORT ROAD TICONDEROGA, NY 12883

(518) 585-5399

Description:

By acceptance of this permit, the permittee agrees that the permit is contingent upon strict compliance with the ECL, all applicable regulations, the General Conditions specified and any Special Conditions included as part of this permit.

Permit Administrator:

MICHAEL J MCMURRAY

NYSDEC PO BOX 296

RAY BROOK, NY 12977-0296

Authorized Signature:

Date: 3 /19/12



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LIST OF CONDITIONS

FEDERALLY ENFORCEABLE CONDITIONS

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Facility Level
1 6 NYCRR 200.6: Acceptable Ambient Air Quality
2 6 NYCRR 201-6.5 (a) (7): Fees
3 6 NYCRR 201-6.5 (c): Recordkeeping and reporting of compliance
         monitoring
4 6 NYCRR 201-6.5 (c) (2): Monitoring, Related Recordkeeping, and
          Reporting Requirements.
5 6 NYCRR 201-6.5 (c) (3) (ii): Compliance Certification
6 6 NYCRR 201-6.5 (e): Compliance Certification
7 6 NYCRR 202-2.1: Compliance Certification
8 6 NYCRR 202-2.5: Recordkeeping requirements
9 6 NYCRR 215.2: Open Fires - Prohibitions
10 6 NYCRR 200.7: Maintenance of Equipment
11 6 NYCRR 201-1.7: Recycling and Salvage
12 6 NYCRR 201-1.8: Prohibition of Reintroduction of Collected
          Contaminants to the air
13 6 NYCRR 201-3.2 (a): Exempt Sources - Proof of Eligibility
14 6 NYCRR 201-3.3 (a): Trivial Sources - Proof of Eligibility
15 6 NYCRR 201-6.5 (a) (4): Standard Requirement - Provide Information
16 6 NYCRR 201-6.5 (a) (8): General Condition - Right to Inspect
17 6 NYCRR 201-6.5 (d) (5): Standard Requirements - Progress Reports
18 6 NYCRR 201-6.5 (f) (6): Off Permit Changes
19 6 NYCRR 202-1.1: Required Emissions Tests
20 40 CFR Part 68: Accidental release provisions.
21 40CFR 82, Subpart F: Recycling and Emissions Reduction
22 6 NYCRR Subpart 201-6: Emission Unit Definition
23 6 NYCRR 201-6.5 (g): Non Applicable requirements
24 6 NYCRR 211.1: Air pollution prohibited
25 6 NYCRR 212.6 (a): Compliance Certification
26 6 NYCRR 225-1.2 (d): Compliance Certification
27 6 NYCRR 225-2.7: Compliance Certification
28 6 NYCRR 243-1.6 (c): NOx Ozone Season Emission Requirements
29 6 NYCRR 243-1.6 (d): Excess emission requirements
30 6 NYCRR 243-1.6 (e): Recordkeeping and reporting requirements
31 6 NYCRR 243-2.1: Authorization and responsibilities of CAIR
          designated representative
32 6 NYCRR 243-8.1: General requirements
33 6 NYCRR 243-8.1: Prohibitions
34 6 NYCRR 243-8.5 (d): Quarterly reports
35 6 NYCRR 243-8.5 (e): Compliance certification
36 6 NYCRR 249.3 (f): Compliance Certification
37 40CFR 63.8(d)(2), Subpart A: Compliance Certification
38 40CFR 63.10, Subpart A: § 63.10(b) General Recordkeeping Requirements
39 40CFR 63.10, Subpart A: §63.10(d) General Reporting Requirements
40 40CFR 63.10, Subpart A: Compliance Certification
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41 40CFR 63.10, Subpart A: Compliance Certification 42 40CFR 63, Subpart S: Compliance Certification



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- 43 40CFR 63.454(b), Subpart S: Compliance Certification
- 44 40CFR 63.454(b), Subpart S: Compliance Certification
- 45 40CFR 63, Subpart MM: Compliance Certification

Emission Unit Level

- 46 6 NYCRR Subpart 201-6: Emission Point Definition By Emission Unit
- 47 6 NYCRR Subpart 201-6: Process Definition By Emission Unit

EU=B-PLANT

- 48-40CFR 63.445(b), Subpart S: Bleaching Systems Closed vent System and Control Device Requirements
- 49 40CFR 63.445(e)(2), Subpart S: Compliance Certification
- 50 40CFR 63.450(d), Subpart S: Compliance Certification

EU=B-PLANT,Proc=116,ES=10094

- 51 40CFR 63.453(c), Subpart S: Compliance Certification
- 52 40CFR 63.453(c), Subpart S: Compliance Certification
- 53 40CFR 63.453(c), Subpart S: Compliance Certification

EU=P-OWERH

- 54 6 NYCRR 200.6: Compliance Certification
- 55 6 NYCRR 225-1.7 (c): Compliance Certification
- 56 6 NYCRR 225-1.7 (e): Compliance Certification
- 57 6 NYCRR 225-2.3 (b) (1): Compliance Certification
- 58 6 NYCRR 227-1.2: Compliance Certification
- 59 6 NYCRR 227-1.2 (a) (3): Compliance Certification
- 60 40CFR 63, Subpart DDDDD: Compliance Certification

EU=P-OWERH,Proc=111

61 40CFR 63.443(d)(4), Subpart S: Compliance Certification

EU=P-OWERH,EP=00044

- 62 6 NYCRR 227-1.3 (a): Compliance Certification
- 63 40CFR 52.21(k), Subpart A: Compliance Certification
- 64 40CFR 52.21(k), Subpart A: Compliance Certification
- 65 40CFR 52.21(k), Subpart A: Compliance Certification

EU=P-ULPIN

- 66 40CFR 63.443(d), Subpart S: Compliance Certification
- 67 40CFR 63.446(e)(1), Subpart S: Compliance Certification
- 68 40CFR 63.450(d), Subpart S: Compliance Certification

EU=R-CAUST,Proc=115

- 69 6 NYCRR 212.3: Compliance Certification
- 70 6 NYCRR 212.10: Compliance Certification

EU=R-CAUST,Proc=115,ES=10005

71 6 NYCRR 225-2.3 (b) (1): Compliance Certification

EU=R-CAUST,Proc=115,ES=10077

- 72 6 NYCRR 212.11 (b) (5): Compliance Certification
- 73 40CFR 63.864(k), Subpart MM: Compliance Certification



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74 40CFR 63.864(k), Subpart MM: Compliance Certification

EU=R-CAUST,EP=00005

75 40CFR 63.862(a)(ii), Subpart MM: Compliance Certification

EU=R-ECOVB

76 6 NYCRR 212.3: Compliance Certification

77 6 NYCRR 212.3: Compliance Certification

EU=R-ECOVB,Proc=103,ES=10001

- 78 40CFR 63.862(a)(ii), Subpart MM: Compliance Certification
- 79 40CFR 63.864(d), Subpart MM: Compliance Certification
- 80 40CFR 63.864(k), Subpart MM: Compliance Certification
- 81 40CFR 63.864(k), Subpart MM: Compliance Certification
- 82 40CFR 63.867(b)(3), Subpart MM: Compliance Certification

EU=R-ECOVB,Proc=105,ES=10003

83 40CFR 63.862(a)(ii), Subpart MM: Compliance Certification

EU=R-ECOVB,Proc=105,ES=10102

- 84 40CFR 63.864(k), Subpart MM: Compliance Certification
- 85 40CFR 63.864(k), Subpart MM: Compliance Certification

EU=R-ECOVB,EP=00001,Proc=103,ES=10001

86 6 NYCRR 212.10: Compliance Certification

EU=R-ECOVB,EP=00001,Proc=104,ES=10001

87 6 NYCRR 212.4: Compliance Certification

STATE ONLY ENFORCEABLE CONDITIONS

Facility Level

- 88 ECL 19-0301: Contaminant List
- 89 6 NYCRR 201-1.4: Unavoidable noncompliance and violations
- 90 6 NYCRR 212.3 (a): Emissions from existing sources

Emission Unit Level

EU=P-OWERH,EP=00044

91 6 NYCRR 227-2.4 (a) (1): Compliance Demonstration

92 6 NYCRR 227-2.4 (a) (1): Compliance Demonstration



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Applicable Federal Requirement: 40CFR 82, Subpart F

Item 21.1:

The permittee shall comply with all applicable provisions of 40 CFR Part 82.

The following conditions are subject to annual compliance certification requirements for Title V permits only.

Condition 22: Emission Unit Definition

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR Subpart 201-6

Item 22.1:

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: 0-PAPER
Emission Unit Description:

Paper mill: the paper mill converts pulp to various finished paper products via the nos. 7 and 8 paper machines. Operations in the paper mill include additive preparation, stock preparation, paper production, and finishing.

Building(s): 4

Item 22.2:

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: 0-WWTRT

Emission Unit Description:

The Ticonderoga Mill wastewater treatment plant provides neutralization, primary clarification, secondary biological treatment with aeration, wetlands treatment, secondary clarification, tertiary clarification, primary sludge dewatering and secondary sludge dewatering. Sources of wastewater include wood handling, pulp production, paper manufacturing, water treatment plant solids, boiler water treatment, electrical power generation, landfill leachate, sanitary wastewater and stormwater. Wastewater is conveyed to the various sections of the wastewater treatment plant through a network of underground pipelines.

Building(s): 35

Item 22.3:

The facility is authorized to perform regulated processes under this permit for:



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Emission Unit: B-PLANT Emission Unit Description:

> Bleach plant area source: The bleach plant whitens pulp for paper production. Equipment venting to the bleach plant scrubber includes the #10 tower (first bleaching stage), #15 seal pit and washer hood, #25 seal pit and washer hood, #35 seal pit and washer hood, #45 seal pit and washer hood, #55 seal pit and washer hood, #30 tower (third bleaching stage), #50 tower (fifth bleaching stage), the chlorine dioxide absorber, the pulp mill acid sewer, the emergency pressure relief hatches from two chlorine dioxide generators, the vents from two chlorine dioxide storage tanks, the spent acid surge tank and a vent from a pulp mill chemical lab hood.. Processes that do not vent to the bleach plant scrubber include the second bleaching stage (20 tower) the fourth bleaching stage (40 tower) and four bleach pulp storage tanks (#7, #8, #9, and #10 high density storage tanks).

Building(s): 6

Item 22.4:

The facility is authorized to perform regulated processes under this permit for: **Emission Unit: P-OWERH**

Emission Unit Description:

The power boiler is a multi-fuel boiler that is permitted to fire no. 6 fuel oil, waste fuel type "A", wood residue consisting of bark, wood and sawdust, rejected digester wood knots, primary clarifier fiber and dried secondary biomass for the production of steam and electricity via a turbine generator. In addition, the power boiler is used to treat non-condensible gases (NCGs), which are produced in the pulping and chemical recovery processes, through thermal oxidation. It is not an incinerator and incinerator regulations such as 6NYCRR Part 219 and 40CFR61 Subpart E do not apply.

Building(s): 29

Item 22.5:

The facility is authorized to perform regulated processes under this permit for: **Emission Unit: P-ULPIN**

Emission Unit Description:

This emission unit contains the kraft pulping digester system, evaporator system, knotter system, decker system and pulp washing system from both the powerhouse and pulp mill. In this emission unit the kraft pulping process is used to produce brown pulp from wood chips. In addition, this emission unit contains processes that prepare the spent cooking liquor for chemical recovery in the recovery furnace. Processes in this emission unit are subject to maximum achievable control technology (MACT) contained in



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Item 22.6:

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: R-CAUST Emission Unit Description:

> Recausticizing area source: the Ticonderoga Mill recausticizing area performs the following tasks: clarifies green liquor from the smelt dissolving tank. produces white liquor slurry by reacting clarified green liquor with burnt lime from the kiln and/or purchased lime via slaker and causticizers. - clarifies white liquor slurry producing white liquor for use in the digester. washes, stores and feeds lime mud from the white liquor clarifiers and converts it into "burnt" lime through a process called "calcining" in the lime kiln. The lime kiln primarily burns #6 oil and uses propane as a fuel for startup and process stabilization. Equipment in the recausticizing area includes a lime kiln, one green liquor clarifier, two green liquor storage tanks, one lime slaker, three causticizers, one white liquor clarifier, two white liquor storage tanks, one white liquor receiver tank, one sewer clarifier, one mud washer tank, one weak wash storage tank, lime mud mix tank, lime mud storage tank, mud filter hood vent, and vacuum pumps for the dregs filters and lime mud filter.

Building(s): 19

Item 22.7:

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: R-ECOVB Emission Unit Description:

The recovery furnace emission unit consists of a kraft recovery furnace and a smelt dissolving tank. The recovery furnace fires black liquor and number 6 oil to produce steam for manufacturing operations and smelt. Smelt (sulfur and sodium chemicals recycled in the draft process) flows from the bottom of the recovery boiler into the smelt dissolving tank to form green liquor. Recovery emissions flow through an electrostatic precipitator. Smelt dissolving tank emissions flow through a wet impact wet scrubber.

Building(s): 29

Item 22.8:

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: W-OODYD
Emission Unit Description:

The woodyard processing area provides delivery and



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substituted in accordance with 40 CFR 75.34(a)(1), the add-on emission controls were operating within the range of parameters listed in the quality assurance/quality control program under appendix B to 40 CFR Part 75 and the substitute data values do not systematically underestimate NOx emissions; and

(3) for a unit that is reporting on a control period basis under subparagraph (d)(2)(ii) of this section, the NOx emission rate and NOx concentration values substituted for missing data under Subpart D of 40 CFR Part 75 are calculated using only values from a control period and do not systematically underestimate NOx emissions.

Compliance Certification Condition 36:

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR 249.3 (f)

Item 36.1:

The Compliance Certification activity will be performed for the facility: The Compliance Certification applies to:

Emission Unit: P-OWERH

Emission Source: 10044 Process: 106

Emission Unit: R-ECOVB

Process: 103 Emission Source: 10001

Item 36.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

The emission limits in this permit for NOx, SO2, and/or PM10 established under Part 249 are based on New York's Best Available Retrofit Technology (BART) Rule (6 NYCRR Part 249), are effective on the date of this permit's issuance, and are state-enforceable. Federal enforceability of these facility-specific requirements is effective on the date on which these emission limits, as submitted to EPA as a revision to New York State's Implementation Plan for Regional Haze, are published in the Federal Register.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 6 calendar month(s).

Condition 37: **Compliance Certification**

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 63.8(d)(2), Subpart A



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Emission Source/Control: 10078 - Process

Emission Source/Control: 10079 - Process

Emission Source/Control: 10080 - Process

Emission Source/Control: 10081 - Process

Emission Source/Control: 10082 - Process

Emission Source/Control: 10083 - Process

Item 47.5:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: P-OWERH

Process: 106 Source Classification Code: 1-02-004-01

Process Description:

Firing No. 6 fuel oil or waste fuel type "A" in the

power boiler.

Emission Source/Control: 10044 - Combustion Design Capacity: 855 million Btu per hour

Emission Source/Control: 10072 - Control

Control Type: MULTIPLE CYCLONE W/O FLY ASH INJECTION

Emission Source/Control: 10074 - Control Control Type: SODIUM-ALKALI SCRUBBING

Item 47.6:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: P-OWERH

Process: 107 Source Classification Code: 1-02-009-02

Process Description:

Firing bark and wood in the power boiler. The bark/wood firing rate shall not exceed 450 wet tons per day.

Emission Source/Control: 10044 - Combustion Design Capacity: 855 million Btu per hour

Emission Source/Control: 10072 - Control

Control Type: MULTIPLE CYCLONE W/O FLY ASH INJECTION

Emission Source/Control: 10074 - Control Control Type: SODIUM-ALKALI SCRUBBING

Item 47.7:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: P-OWERH

Renewal 2



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Item 47.14:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: R-CAUST

Process: 115 Source Classification Code: 3-07-001-06

Process Description:

The lime kiln converts lime mud to burnt lime through a process called "calcining". The lime kiln primarily burns #6 oil and uses propane as a fuel for startup and process stabilization.

Emission Source/Control: 10077 - Control

Control Type: WET SCRUBBER

Emission Source/Control: 10005 - Process

Item 47.15:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: R-ECOVB

Process: 103 Source Classification Code: 3-07-001-10

Process Description:

Babcock and Wilcox recovery furnace fired on black

liquor.

Emission Source/Control: 10101 - Control

Control Type: ELECTROSTATIC PRECIPITATOR

Emission Source/Control: 10104 - Control

Control Type: ELECTROSTATIC PRECIPITATOR

Emission Source/Control: 10001 - Process

Item 47.16:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: R-ECOVB

Process: 104 Source Classification Code: 1-02-004-01

Process Description:

Babcock and Wilcox recovery furnace fired on 1.5% sulfur

#6 fuel oil.

Emission Source/Control: 10001 - Process

Item 47.17:

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: R-ECOVB

Process: 105 Source Classification Code: 3-07-001-05

Process Description:

Smelt dissolving tank where smelt from a recovery furnace

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Item 58.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: MONITORING OF PROCESS OR CONTROL
DEVICE PARAMETERS AS SURROGATE

Monitoring Description:

The firing rate of bark and wood shall not exceed the rate demonstrated during the last particulate compliance test. The current limit is 450 wet tons per day.

Dewatered secondary biosolids, rejected wood knots or primary clarifier fiber may be substituted for wood or bark at the ratio of 1 part alternative fuel to 10 parts wood or bark – not to exceed the daily maximum of 40 cubic yards for any one alternative fuel. A log shall be maintained on-site which indicates the date and volume of each delivery of alternative fuel to the woodyard.

Parameter Monitored: WOOD

Upper Permit Limit: 450 tons per day

Monitoring Frequency: DAILY

Averaging Method: 24-HOUR MAXIMUM - NOT TO BE EXCEEDED MORE THAN ONCE PER CALENDAR YEAR

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 6 calendar month(s).

Condition 59: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR 227-1.2 (a) (3)

Item 59.1:

The Compliance Certification activity will be performed for:

Emission Unit: P-OWERH

Regulated Contaminant(s):

CAS No: 0NY075-00-0 PARTICULATES

Item 59.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: INTERMITTENT EMISSION TESTING

Monitoring Description:

Emissions of particulates shall not exceed a rate of 0.10 pounds per million Btus. Stack testing to demonstrate compliance with this limit will be performed once during the permit term unless additional testing is required by the permitting authority.

Parameter Monitored: PARTICULATES



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Upper Permit Limit: 0.10 pounds per million Btus

Reference Test Method: method 5

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING

DESCRIPTION

Averaging Method: AVERAGING METHOD AS PER REFERENCE TEST

METHOD INDICATED

Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

Condition 60: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 63, Subpart DDDDD

Item 60.1:

The Compliance Certification activity will be performed for:

Emission Unit: P-OWERH

Item 60.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

The facility must meet the requirements established under the National Emissions Standards for Hazardous Air Pollutants (NESHAP) for Industrial, Commercial and Institutional Boilers. This will also satisfy particulate emission requirements under 6NYCRR Part 249 (Best Available Retrofit Technology).

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 6 calendar month(s).

Condition 61: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 63.443(d)(4), Subpart S

Item 61.1:

The Compliance Certification activity will be performed for:

Emission Unit: P-OWERH

Process: 111

Item 61.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES



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METHOD INDICATED

Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

Condition 64: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 52.21(k), Subpart A

Item 64.1:

The Compliance Certification activity will be performed for:

Emission Unit: P-OWERH Emission Point: 00044

Regulated Contaminant(s):

CAS No: 007446-09-5 SULFUR DIOXIDE

Item 64.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: CONTINUOUS EMISSION MONITORING (CEM)

Monitoring Description:

The facility must continuously calculate and record SO2 emissions during all periods of boiler operation, except during CEM quality control checks or routine maintenance. SO2 emissions shall not exceed 309 lb/hr (rolling 24 hour average). This will also satisfy sulfur dioxide emission requirements under 6NYCRR Part 249 (Best Available Retrofit Technology).

The SO2 CEM system shall be installed, calibrated, operated and maintained in accordance with 40CFR75 and/or 40CFR60, Appendix B and Appendix F. Either a certified flow monitor or the most restrictive F-factor for the multiple fuel mix shall be used to measure stack flowrate.

Manufacturer Name/Model Number: Thermo Environmental 43 CHL

Upper Permit Limit: 309 pounds per hour Reference Test Method: 40CFR60 Appx B PS2 Monitoring Frequency: CONTINUOUS

Averaging Method: 24-HR ROLLING AVG., CALCULATED EA. HR

AS THE AVG OF THE PAST 24 OPERATING

HRS

Reporting Requirements: QUARTERLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 3 calendar month(s).

Condition 65: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 52.21(k), Subpart A



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Monitoring Type: CONTINUOUS EMISSION MONITORING (CEM) Monitoring Description:

Emissions of total reduced sulfur from the recovery furnace shall not exceed 8 ppm (dry - corrected to 8% oxygen) for more than 60 cumulative minutes per day. This corresponds to 10 ppm before adjustment. The permittee shall install, calibrate, operate and maintain a continuous emission monitoring system for the recovery furnace emissions. CEMS must be in operation at all times except during calibration checks, adjustments and periods of repair. This standard of performance shall not be applicable during a period of 24 hours immediately before actual shutdown or during a period of 24 hours immediately following commencement of start-up operations. A limit of 10 ppm is a requirement of consent order #1743 executed on September 23, 1974.

Manufacturer Name/Model Number: Thermo Environmental 43C

Parameter Monitored: TOTAL REDUCED SULFUR

Upper Permit Limit: 8 parts per million (by volume)

Reference Test Method: 40CFR60.284 Modified

Monitoring Frequency: CONTINUOUS

Averaging Method: AVERAGING METHOD - SEE MONITORING

DESCRIPTION

Reporting Requirements: QUARTERLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 3 calendar month(s).

Condition 77: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR 212.3

Item 77.1:

The Compliance Certification activity will be performed for:

Emission Unit: R-ECOVB

Regulated Contaminant(s):

CAS No: 0NY500-00-0 TOTAL REDUCED SULFUR

Item 77.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: CONTINUOUS EMISSION MONITORING (CEM) Monitoring Description:

Emissions of total reduced sulfur from the recovery furnace shall not exceed 4 ppm (dry - corrected to 8% oxygen) for a daily average. This corresponds to 5 ppm before adjustment. This standard of performance shall not be applicable during a period of 24 hours immediately

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before actual shutdown or during a period of 24 hours immediately following commencement of start-up operations of the recovery furnace. A limit of 5 ppm is a requirement of consent order #1743 executed September 23, 1974.

Compliance with this limit demonstrates that the staged combustion air system is operating properly. This controls SO2 formation as well and satisfies the SO2 emission requirements under 6NYCRR part 249 (Best Available Retrofit Technology).

Manufacturer Name/Model Number: Thermo Environmental 43C

Parameter Monitored: TOTAL REDUCED SULFUR Upper Permit Limit: 4 parts per million (by volume) Reference Test Method: 40CFR60.284 modified Monitoring Frequency: CONTINUOUS

Averaging Method: 24 HOUR DAILY AVERAGE (ARITHMETIC MEAN

- APP. A, METHOD 19)

Reporting Requirements: QUARTERLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 3 calendar month(s).

Condition 78: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement:40CFR 63.862(a)(ii), Subpart MM

Item 78.1:

The Compliance Certification activity will be performed for:

Emission Unit: R-ECOVB

Process: 103 Emission Source: 10001

Regulated Contaminant(s):

CAS No: 0NY075-00-0 PARTICULATES

Item 78.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: INTERMITTENT EMISSION TESTING

Monitoring Description:

Particulate emissions discharged to the atmosphere from the recovery furnace will be tested once per permit term unless additional testing is required by the permitting authority. The measured particulate concentration must be less than or equal to 0.03 grains per dry standard cubic foot corrected to 8% oxygen content; unless the limits for the chemical recovery system (lime kiln, recovery furnace and smelt dissolving tank) are revised according to the procedures specified in Subpart MM.

The recovery furnace is also subject to a particulate



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matter limit under 6NYCRR 212.4. This limit is 0.05 grains per dry standard cubic foot of exhaust gas. The more restrictive of the state or federal limits shall apply in the event that the MACT limit is revised. This will also satisfy particulate emission requirements under 6NYCRR Part 249 (Best Available Retrofit Technology).

Upper Permit Limit: 0.03 grains per dscf

Reference Test Method: Method 5

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING

DESCRIPTION

Averaging Method: AVERAGING METHOD AS PER REFERENCE TEST

METHOD INDICATED

Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

Condition 79: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 63.864(d), Subpart MM

Item 79.1:

The Compliance Certification activity will be performed for:

Emission Unit: R-ECOVB

Process: 103 Emission Source: 10001

Item 79.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES Monitoring Description:

A system for monitoring and recording the opacity of the recovery furnace discharge must be installed in each recovery furnace stack. This system must meet the performance, installation and quality assurance requirements outlined in 63.864(d) and 40CFR60 Appendix B PS-1. For all periods of recovery furnace operation, the COMS must be in continuous operation except during ealibration checks, zero or span adjustments, or periods of monitor system repair.

Monitoring Frequency: CONTINUOUS
Reporting Requirements: SEMI-ANNUALLY (CALENDAR)
Reports due 30 days after the reporting period.
The initial report is due 4/30/2012.
Subsequent reports are due every 6 calendar month(s).

Condition 80: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 40CFR 63.864(k), Subpart MM



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according to the procedures in 63.864(j)(3), the average scrubber pressure drop must be maintained at or above 5.5 inches of water during each 3-hour averaging period except during periods of startup, shutdown or malfunction. Only one exceedence will be counted during any 24 hour period. Six or more exceedences of pressure drop and/or scrubber liquid flow rate during any 6-month reporting period, not attributed to startup, shutdown or malfunction, constitute a violation of the standard. Corrective action must be implemented any time the 3-hour average pressure drop across the scrubber is below the value established during the performance tests. Periodic reporting must follow the requirements outlined for MACT Subpart MM sources located elsewhere in the permit.

Parameter Monitored: PRESSURE CHANGE
Lower Permit Limit: 5.5 inches of water
Monitoring Frequency: CONTINUOUS
Averaging Method: 3 HOUR ROLLING AVERAGE
Reporting Requirements: SEMI-ANNUALLY (CALENDAR)
Reports due 30 days after the reporting period.

The initial report is due 4/30/2012. Subsequent reports are due every 6 calendar month(s).

Condition 86: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR 212.10

Item 86.1:

The Compliance Certification activity will be performed for:

Emission Unit: R-ECOVB Emission Point: 00001 Process: 103 Emission Source: 10001

Regulated Contaminant(s):

CAS No: 0NY210-00-0 OXIDES OF NITROGEN

Item 86.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: INTERMITTENT EMISSION TESTING Monitoring Description:

The RACT analysis completed in October 1994 concluded that the recovery boiler as it was designed and operated met NOx RACT. A standard of 100 ppmdv corrected to 8% O2 is established and emission testing to verify compliance with this standard will be performed once during the permit term unless additional testing is required by the permitting authority. This will also satisfy nitrogen oxide emission requirements under 6NYCRR Part 249 (Best Available Retrofit Technology).



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Upper Permit Limit: 100 parts per million (by volume)

Reference Test Method: USEPA Method 7

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING

DESCRIPTION

Averaging Method: AVERAGING METHOD AS PER REFERENCE TEST

METHOD INDICATED

Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

Condition 87: Compliance Certification

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable Federal Requirement: 6 NYCRR 212.4

Item 87.1:

The Compliance Certification activity will be performed for:

Emission Unit: R-ECOVB Emission Point: 00001
Process: 104 Emission Source: 10001

Regulated Contaminant(s):

CAS No: 0NY075-00-0 PARTICULATES

Item 87.2:

Compliance Certification shall include the following monitoring:

Monitoring Type: WORK PRACTICE INVOLVING SPECIFIC OPERATIONS

Monitoring Description:

Limit oil use to less that 10% of the total fuel burned in the recovery boiler based on heat input. 10% of heat input is 371,000 MMBTU/yr which equates to 2,470,000 gallons of oil (#6 oil and type A waste fuel combined).

Work Practice Type: PROCESS MATERIAL THRUPUT

Process Material: OIL (NOT ELSEWHERE CLASSIFIED)

Upper Permit Limit: 2470 thousand gallons per year

Monitoring Frequency: MONTHLY

Averaging Method: ANNUAL MAXIMUM ROLLED MONTHLY

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 6 calendar month(s).



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- (e) The Department may also require the owner and/or operator to include in reports described under (a) and (b) above an estimate of the maximum ground level concentration of each air contaminant emitted and the effect of such emissions depending on the deviation of the malfunction and the air contaminants emitted.
- (d) In the event of maintenance, start-up/shutdown or malfunction conditions which result in emissions exceeding any applicable emission standard, the facility owner and/or operator shall take appropriate action to prevent emissions which will result in contravention of any applicable ambient air quality standard. Reasonably available control technology, as determined by the commissioner, shall be applied during any maintenance, start-up/shutdown or malfunction condition subject to this paragraph.
- (e) In order to have a violation of a federal regulation (such as a new source performance standard or national emissions standard for hazardous air pollutants) excused, the specific federal regulation must provide for an affirmative defense during start-up, shutdowns, malfunctions or upsets.

Condition 90: Emissions from existing sources

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable State Requirement: 6 NYCRR 212.3 (a)

Item 90.1:

No person will cause or allow emissions that violate the requirement specified in Table 2, Table 3, or Table 4 of 6NYCRR Part 212 for the environmental rating issued by the commissioner.

**** Emission Unit Level ****

Condition 91: Compliance Demonstration

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable State Requirement: 6 NYCRR 227-2.4 (a) (1)

Item 91.1:

The Compliance Demonstration activity will be performed for:

Emission Unit: P-OWERH Emission Point: 00044

Regulated Contaminant(s):

CAS No: 0NY210-00-0 OXIDES OF NITROGEN

Item 91.2:

Compliance Demonstration shall include the following monitoring:

Monitoring Type: CONTINUOUS EMISSION MONITORING (CEM) Monitoring Description:

The facility must continuously calculate and record NOx emissions during all periods of boiler operation, except during CEM quality control checks or routine maintenance. NOx emissions shall not exceed 0.25 lbs/mmBtu. This limit applies for all periods except during the first 24 hours

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of startup. Compliance with this emission limit shall be determined on a 24-hour average in accordance with the provisions of 6NYCRR Paragraph 227-2.6(a)(1). From October 1 to April 30, the non-ozone season, a 30 day rolling average may be used to demonstrate compliance.

This limit applies until July 1, 2014, after which a new NOX limit will be in force. A permit modification will be issued to incorporate the new limit.

The NOx CEM system shall be installed, calibrated, operated and maintained in accordance with 6NYCRR Subdivision 227-2.6(b).

Compliance with the new NOX limit will also satisfy NOX emission requirements under 6NYCRR Part 249 (Best Available Retrofit Technology).

Manufacturer Name/Model Number: Thermo Environmental Model 42C

Parameter Monitored: OXIDES OF NITROGEN Upper Permit Limit: 0.25 pounds per million Btus

Reference Test Method: PS-2

Monitoring Frequency: CONTINUOUS

Averaging Method: AVERAGING METHOD - SEE MONITORING

DESCRIPTION

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 4/30/2012.

Subsequent reports are due every 6 calendar month(s).

Condition 92: Compliance Demonstration

Effective between the dates of 03/19/2012 and 03/18/2017

Applicable State Requirement: 6 NYCRR 227-2.4 (a) (1)

Item 92.1:

The Compliance Demonstration activity will be performed for:

Emission Unit: P-OWERH Emission Point: 00044

Regulated Contaminant(s):

CAS No: 0NY210-00-0 OXIDES OF NITROGEN

Item 92.2:

Compliance Demonstration shall include the following monitoring:

Monitoring Type: CONTINUOUS EMISSION MONITORING (CEM) Monitoring Description:

The facility must continuously calculate and record NOx emissions during all periods of boiler operation, except during CEM quality control cheeks or routine maintenance. During startup, NOx emissions shall not exceed 122 pounds per hour averaged over the first 24 hours of operation. This equates to 80% of allowable emissions during normal