MICHIGAN DEPARTMENT OF ENVIRONMENT, GREAT LAKES, AND ENERGY
AIR QUALITY DIVISION

November 4, 2024

PERMIT TO INSTALL
128-24

ISSUED TO
Solar Technology LLC

LOCATED AT
1881 North Orr Road
Hemlock, Michigan 48626

IN THE COUNTY OF
Saginaw

STATE REGISTRATION NUMBER
P1443

The Air Quality Division has approved this Permit to Install, pursuant to the delegation of authority from the Michigan Department of Environment, Great Lakes, and Energy. This permit is hereby issued in accordance with and subject to Section 5505(1) of Article II, Chapter I, Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended. Pursuant to Air Pollution Control Rule 336.1201(1), this permit constitutes the permittee's authority to install the identified emission unit(s) in accordance with all administrative rules of the Department and the attached conditions. Operation of the emission unit(s) identified in this Permit to Install is allowed pursuant to Rule 336.1201(6).

DATE OF RECEIPT OF ALL INFORMATION REQUIRED BY RULE 203: **October 25, 2024**	
DATE PERMIT TO INSTALL APPROVED: **November 4, 2024**	SIGNATURE:
DATE PERMIT VOIDED:	SIGNATURE:
DATE PERMIT REVOKED:	SIGNATURE:

PERMIT TO INSTALL

Table of Contents

COMMON ACRONYMS

AQD	Air Quality Division
BACT	Best Available Control Technology
CAA	Clean Air Act
CAM	Compliance Assurance Monitoring
CEMS	Continuous Emission Monitoring System
CFR	Code of Federal Regulations
COMS	Continuous Opacity Monitoring System
Department/department/EGLE	Michigan Department of Environment, Great Lakes, and Energy
EU	Emission Unit
FG	Flexible Group
GACS	Gallons of Applied Coating Solids
GC	General Condition
GHGs	Greenhouse Gases
HVLP	High Volume Low Pressure*
ID	Identification
IRSL	Initial Risk Screening Level
ITSL	Initial Threshold Screening Level
LAER	Lowest Achievable Emission Rate
MACT	Maximum Achievable Control Technology
MAERS	Michigan Air Emissions Reporting System
MAP	Malfunction Abatement Plan
MSDS	Material Safety Data Sheet
NA	Not Applicable
NAAQS	National Ambient Air Quality Standards
NESHAP	National Emission Standard for Hazardous Air Pollutants
NSPS	New Source Performance Standards
NSR	New Source Review
PS	Performance Specification
PSD	Prevention of Significant Deterioration
PTE	Permanent Total Enclosure
PTI	Permit to Install
RACT	Reasonable Available Control Technology
ROP	Renewable Operating Permit
SC	Special Condition
SCR	Selective Catalytic Reduction
SNCR	Selective Non-Catalytic Reduction
SRN	State Registration Number
TBD	To Be Determined
TEQ	Toxicity Equivalence Quotient
USEPA/EPA	United States Environmental Protection Agency
VE	Visible Emissions

*For HVLP applicators, the pressure measured at the gun air cap shall not exceed 10 psig.

POLLUTANT / MEASUREMENT ABBREVIATIONS

acfm	Actual cubic feet per minute
BTU	British Thermal Unit
°C	Degrees Celsius
CO	Carbon Monoxide
CO_2e	Carbon Dioxide Equivalent
dscf	Dry standard cubic foot
dscm	Dry standard cubic meter
°F	Degrees Fahrenheit
gr	Grains
HAP	Hazardous Air Pollutant
Hg	Mercury
hr	Hour
HP	Horsepower
H_2S	Hydrogen Sulfide
kW	Kilowatt
lb	Pound
m	Meter
mg	Milligram
mm	Millimeter
MM	Million
MW	Megawatts
NMOC	Non-Methane Organic Compounds
NO_x	Oxides of Nitrogen
ng	Nanogram
PM	Particulate Matter
PM10	Particulate Matter equal to or less than 10 microns in diameter
PM2.5	Particulate Matter equal to or less than 2.5 microns in diameter
pph	Pounds per hour
ppm	Parts per million
ppmv	Parts per million by volume
ppmw	Parts per million by weight
psia	Pounds per square inch absolute
psig	Pounds per square inch gauge
scf	Standard cubic feet
sec	Seconds
SO_2	Sulfur Dioxide
TAC	Toxic Air Contaminant
Temp	Temperature
THC	Total Hydrocarbons
tpy	Tons per year
µg	Microgram
µm	Micrometer or Micron
VOC	Volatile Organic Compounds
yr	Year

GENERAL CONDITIONS

1. The process or process equipment covered by this permit shall not be reconstructed, relocated, or modified, unless a Permit to Install authorizing such action is issued by the Department, except to the extent such action is exempt from the Permit to Install requirements by any applicable rule. **(R 336.1201(1))**

2. If the installation, construction, reconstruction, relocation, or modification of the equipment for which this permit has been approved has not commenced within 18 months, or has been interrupted for 18 months, this permit shall become void unless otherwise authorized by the Department. Furthermore, the permittee or the designated authorized agent shall notify the Department via the Supervisor, Permit Section, Air Quality Division, Michigan Department of Environment, Great Lakes, and Energy, P.O. Box 30260, Lansing, Michigan 48909-7760, if it is decided not to pursue the installation, construction, reconstruction, relocation, or modification of the equipment allowed by this Permit to Install. **(R 336.1201(4))**

3. If this Permit to Install is issued for a process or process equipment located at a stationary source that is not subject to the Renewable Operating Permit program requirements pursuant to Rule 210 (R 336.1210), operation of the process or process equipment is allowed by this permit if the equipment performs in accordance with the terms and conditions of this Permit to Install. **(R 336.1201(6)(b))**

4. The Department may, after notice and opportunity for a hearing, revoke this Permit to Install if evidence indicates the process or process equipment is not performing in accordance with the terms and conditions of this permit or is violating the Department's rules or the Clean Air Act. **(R 336.1201(8), Section 5510 of Act 451, PA 1994)**

5. The terms and conditions of this Permit to Install shall apply to any person or legal entity that now or hereafter owns or operates the process or process equipment at the location authorized by this Permit to Install. If the new owner or operator submits a written request to the Department pursuant to Rule 219 and the Department approves the request, this permit will be amended to reflect the change of ownership or operational control. The request must include all of the information required by subrules (1)(a), (b), and (c) of Rule 219 and shall be sent to the District Supervisor, Air Quality Division, Michigan Department of Environment, Great Lakes, and Energy. **(R 336.1219)**

6. Operation of this equipment shall not result in the emission of an air contaminant which causes injurious effects to human health or safety, animal life, plant life of significant economic value, or property, or which causes unreasonable interference with the comfortable enjoyment of life and property. **(R 336.1901)**

7. The permittee shall provide notice of an abnormal condition, start-up, shutdown, or malfunction that results in emissions of a hazardous or toxic air pollutant which continue for more than one hour in excess of any applicable standard or limitation, or emissions of any air contaminant continuing for more than two hours in excess of an applicable standard or limitation, as required in Rule 912, to the Department. The notice shall be provided not later than two business days after start-up, shutdown, or discovery of the abnormal condition or malfunction. Written reports, if required, must be filed with the Department within 10 days after the start-up or shutdown occurred, within 10 days after the abnormal conditions or malfunction has been corrected, or within 30 days of discovery of the abnormal condition or malfunction, whichever is first. The written reports shall include all of the information required in Rule 912(5). **(R 336.1912)**

8. Approval of this permit does not exempt the permittee from complying with any future applicable requirements which may be promulgated under Part 55 of 1994 PA 451, as amended or the Federal Clean Air Act.

9. Approval of this permit does not obviate the necessity of obtaining such permits or approvals from other units of government as required by law.

10. Operation of this equipment may be subject to other requirements of Part 55 of 1994 PA 451, as amended and the rules promulgated thereunder.

11. Except as provided in subrules (2) and (3) or unless the special conditions of the Permit to Install include an alternate opacity limit established pursuant to subrule (4) of Rule 301, the permittee shall not cause or permit to be discharged into the outer air from a process or process equipment a visible emission of density greater than the most stringent of the following. The grading of visible emissions shall be determined in accordance with Rule 303 (R 336.1303). **(R 336.1301)**
    a) A six-minute average of 20 percent opacity, except for one six-minute average per hour of not more than 27 percent opacity.
    b) A visible emission limit specified by an applicable federal new source performance standard.
    c) A visible emission limit specified as a condition of this Permit to Install.

12. Collected air contaminants shall be removed as necessary to maintain the equipment at the required operating efficiency. The collection and disposal of air contaminants shall be performed in a manner so as to minimize the introduction of contaminants to the outer air. Transport of collected air contaminants in Priority I and II areas requires the use of material handling methods specified in Rule 370(2). **(R 336.1370)**

13. The Department may require the permittee to conduct acceptable performance tests, at the permittee's expense, in accordance with Rule 1001 and Rule 1003, under any of the conditions listed in Rule 1001. **(R 336.2001)**

EMISSION UNIT SPECIAL CONDITIONS

EMISSION UNIT SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

Emission Unit ID	Emission Unit Description (Including Process Equipment & Control Device(s))	Installation Date / Modification Date	Flexible Group ID
EULOADING	Raw material loading operations for the crystallization process. Includes crucibles and hoppers. Particulate emissions are controlled by dust collectors.	TBD	FGDUSTCOLLECTR
EUMELTING	Melting and crystallization process. Particulate emissions are controlled by dust collectors.	TBD	FGDUSTCOLLECTR
EUMANUALGRIND	Manual silica crystal grinding conducted at four manual stations. Particulate emissions controlled by a dust collector.	TBD	FGDUSTCOLLECTR
EUCRUSHING	Recycled crystalline silica crushing conducted at 3 crushers. Particulate emissions controlled by dust collectors.	TBD	FGDUSTCOLLECTR
EUINSPECTION	Post melting and crystallization inspection process. Particulate emissions are controlled by dust collectors.	TBD	FGDUSTCOLLECTR
EURECYCLE	Recycling of scrap silicon for reuse in the melting and crystallization process. Includes crushers, magnetic separation, and drying. Particulate emissions are controlled by dust collectors. VOC and other organics are controlled by a regenerative thermal oxidizer (RTO). Acid gas emissions are controlled by an alkaline wet scrubber.	TBD	FGDUSTCOLLECTR, FGRTO, FGACIDGASSCRUB
EUSLICING	Wire saw slicing operations utilizing six slicing machines. Particulate emissions are controlled by mist eliminators.	TBD	FGMISTELIMINTR
EUGRINDING	Silica crystal grinding conducted by three grinding machines. Particulate emissions controlled by mist eliminators.	TBD	FGMISTELIMINTR
EUSQUARER	Squaring machine. Particulate emissions are controlled by a mist eliminator.	TBD	FGMISTELIMINTR
EUCLEANUP	Facility wide solvent cleaning operations.	TBD	NA

Emission Unit ID	Emission Unit Description (Including Process Equipment & Control Device(s))	Installation Date / Modification Date	Flexible Group ID
EUDEGUMMING	Degumming operations using agents for the removal of adhesives. Degumming takes place in 12 tanks. VOC and other organics are controlled by an RTO.	TBD	FGRTO
EUGLUING	Adhesives application process occurring at 75 stations. VOC and other organics are controlled by an RTO.	TBD	FGRTO
EUDEBONDING	Heating of plastic/steel holder assembly to remove the applied glue/adhesive. VOC and other organics are controlled by an RTO.	TBD	FGRTO
EUDETERGENT	Process tank cleaning operations using detergents. Cleaning takes place in 10 tanks.	TBD	NA
EUCOOLANT	Slicing coolant application that occurs at 75 stations.	TBD	NA
EUWWTP	Wastewater treatment plant for the facility.	TBD	NA
EUEMGEN1	2,923-bhp Diesel-fired emergency generator. Engine is subject to NSPS IIII.	TBD	FGEMGEN
EUEMGEN2	2,923-bhp Diesel-fired emergency generator. Engine is subject to NSPS IIII.	TBD	FGEMGEN
EUEMGEN3	2,923-bhp Diesel-fired emergency generator. Engine is subject to NSPS IIII.	TBD	FGEMGEN
EUEMGEN4	2,923-bhp Diesel-fired emergency generator. Engine is subject to NSPS IIII.	TBD	FGEMGEN
EUFIREPUMP	350-bhp Diesel-fired fire pump. Engine is subject to NSPS IIII.	TBD	FGEMGEN
EUFACILITYCT	Facility cooling tower comprised of four units having four cells each. Each cell has a circulation rate of 2,000 gallons per minute (gpm).	TBD	FGCOOLINGTWR
EUPROCESSCT	Process cooling tower comprised of four units having four cells each. Each cell has a circulation rate of 2,000 gallons per minute (gpm).	TBD	FGCOOLINGTWR
EUHVAC-RTU	Nineteen rooftop mounted natural gas fired HVAC units with combined heat input rates of 24.18 mmBtu/hr.	TBD	FGHVAC
EUHVAC-AHU	Twenty-three natural gas fired HVAC air handling units with combined heat input rates of 48.73 mmBtu/hr.	TBD	FGHVAC
EUHVAC-RTH	Ten natural gas fired HVAC heaters with combined heat input rates of 1.0 mmBtu/hr.	TBD	FGHVAC

Emission Unit ID	Emission Unit Description (Including Process Equipment & Control Device(s))	Installation Date / Modification Date	Flexible Group ID
EUHVAC-GUH	Twenty-two natural gas fired HVAC gas unit heaters with combined heat input rates of 0.66 mmBtu/hr.	TBD	FGHVAC
EUHVAC-DOA	Twenty natural gas fired HVAC dedicated outside air units with combined heat input rates of 24 mmBtu/hr.	TBD	FGHVAC
EUHVAC-MAU	Four natural gas fired HVAC make up air units with combined heat input rates of 3.92 mmBtu/hr.	TBD	FGHVAC
EUBOILER1	8,000,000 btu/hr natural gas-fired boiler.	TBD	FGBOILERS
EUBOILER2	8,000,000 btu/hr natural gas-fired boiler.	TBD	FGBOILERS
EUBOILER3	8,000,000 btu/hr natural gas-fired boiler.	TBD	FGBOILERS

Changes to the equipment described in this table are subject to the requirements of R 336.1201, except as allowed by R 336.1278 to R 336.1291.

EUCLEANUP
EMISSION UNIT CONDITIONS

DESCRIPTION

Facility wide solvent cleaning operations.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	3.0 tpy	12-month rolling time period as determined at the end of each calendar month	EUCLEANUP	SC VI.3	R 336.1702(d)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(d))**

2. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each raw material used, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer's formulation data, or both as deemed acceptable by the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1225, R 336.1702)**

3. The permittee shall keep the following information on a calendar month basis for EUCLEANUP:

a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.

b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(d))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUDEGUMMING
EMISSION UNIT CONDITIONS

DESCRIPTION

Degumming operations using agents for the removal of adhesives. Degumming takes place in 12 tanks. VOC and other organics are controlled by an RTO.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

RTO (Special Conditions under FGRTO)

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	0.13 tpy[a]	12-month rolling time period as determined at the end of each calendar month	EUDEGUMMING	SC VI.3	R 336.1702(a)
[a] Emission limit based on uncontrolled emissions from the process.					

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate EUDEGUMMING unless the RTO is installed, maintained, and operated in a satisfactory manner as described in FGRTO. **(R 336.1901, R 336.1910)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each raw material used, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer's formulation data, or both as deemed acceptable by the AQD District Supervisor. The

permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1225, R 336.1702(a))**

3. The permittee shall keep the following information on a calendar month basis for EUDEGUMMING:
   a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.
   b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

   The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUGLUING
EMISSION UNIT CONDITIONS

DESCRIPTION

Adhesives application process occurring at 75 stations. VOC and other organics are controlled by an RTO.

Flexible Group ID: FGRTO

POLLUTION CONTROL EQUIPMENT

RTO (Special Conditions under FGRTO)

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	0.54 tpy[a]	12-month rolling time period as determined at the end of each calendar month	EUGLUING	SC VI.3	R 336.1702(a)

[a] Emission limit based on uncontrolled emissions from the process.

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate EUGLUING unless the RTO is installed, maintained, and operated in a satisfactory manner as described in FGRTO. **(R 336.1901, R 336.1910)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall determine the VOC content, water content and density of any adhesive, as applied and as received, using federal Reference Test Method 24. Upon prior written approval by the AQD District Supervisor, the permittee may determine the VOC content from manufacturer's formulation data. If the Method 24 and the formulation values should differ, the permittee shall use the Method 24 results to determine compliance. **(R 336.1702)**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each raw material used, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer's formulation data, or both as deemed acceptable by the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1225, R 336.1702)**

3. The permittee shall keep the following information on a calendar month basis for EUGLUING:
   a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.
   b) VOC mass emission calculations determining the annual emission rate by in tons per 12-month rolling time period as determined at the end of each calendar month.

   The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUDEBONDING
EMISSION UNIT CONDITIONS

DESCRIPTION

Heating of plastic/steel holder assembly to remove the applied glue/adhesive. VOC and other organics are controlled by an RTO.

Flexible Group ID: FGRTO

POLLUTION CONTROL EQUIPMENT

RTO (Special Conditions under FGRTO)

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	0.88 tpy[a,b]	12-month rolling time period as determined at the end of each calendar month	EUDEBONDING	SC VI.2	R 336.1702(a)

[a] Emission limit based on uncontrolled emissions from the process.
[b] Emissions from the organic furnace (in EURECYCLE) are included in this limit.

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate EUDEBONDING unless the RTO is installed, maintained, and operated in a satisfactory manner as described in FGRTO. **(R 336.1901, R 336.1910)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall keep the following information on a calendar month basis for EUDEBONDING:
   a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.

b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUDETERGENT
EMISSION UNIT CONDITIONS

DESCRIPTION

Process tank cleaning operations using detergents. Cleaning takes place in 10 tanks.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	2.88 tpy	12-month rolling time period as determined at the end of each calendar month	EUDETERGENT	SC VI.3	R 336.1702(a)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each raw material used, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer's formulation data, or both as deemed acceptable by the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1225, R 336.1702)**

3. The permittee shall keep the following information on a calendar month basis for EUDETERGENT:

a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.

b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUCOOLANT
EMISSION UNIT CONDITIONS

DESCRIPTION

Slicing coolant application that occurs at 75 stations.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	1.49 tpy	12-month rolling time period as determined at the end of each calendar month	EUCOOLANT	SC VI.3	R 336.1702(a)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each raw material used, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer's formulation data, or both as deemed acceptable by the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1225, R 336.1702(a))**

3. The permittee shall keep the following information on a calendar month basis for EUCOOLANT:

a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.

b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

EUWWTP
EMISSION UNIT CONDITIONS

DESCRIPTION

Wastewater treatment plant for the facility.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. VOC	2.7 tpy	12-month rolling time period as determined at the end of each calendar month	EUWWTP	SC VI.2	R 336.1702(a)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, R 336.1702(a))**

2. The permittee shall keep the following information on a calendar month basis for EUWWTP:
   a) VOC mass emission calculations determining the monthly emission rate in pounds per calendar month.
   b) VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1702(a))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FLEXIBLE GROUP SPECIAL CONDITIONS

FLEXIBLE GROUP SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

Flexible Group ID	Flexible Group Description	Associated Emission Unit IDs
FGRTO	Collection of equipment venting to an RTO with a capacity of <10 mmBtu/hr.	EURECYCLE, EUGLUING, EUDEGUMMING, EUDEBONDING
FGACIDGASSCRUB	Wet scrubber to reduce acid gas emissions from material cleaning conducted in the recycling area.	EURECYCLE
FGDUSTCOLLECTR	Collection of equipment venting to several dust collectors.	EULOADING, EUMELTING, EUINSPECTION, EURECYCLE, EUMANUALGRIND, EUCRUSHING
FGMISTELIMINTR	Collection of equipment venting to several mist eliminators.	EUSLICING, EUGRINDING, EUSQUARER
FGCOOLINGTWR	Cooling towers serve the facility and process.	EUFACILITYCT, EUPROCESSCT
FGEMGEN	Emergency generator engines and a fire pump. Engines are subject to NSPS IIII.	EUEMGEN1, EUEMGEN2, EUEMGEN3, EUEMGEN4, EUFIREPUMP
FGHVAC	Collection of natural gas combustion units (< 3.0 mmbtu/hr each) that serve the facility.	EUHVAC-RTU, EUHVAC-AHU, EUHVAC-RTH, EUHVAC-GUH, EUHVAC-DOA, EUHVAC-MAU
FGBOILERS	Three natural gas fired boilers.	EUBOILER1, EUBOILER2, EUBOILER3

FGRTO
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Collection of equipment venting to an RTO with a capacity of <10 mmBtu/hr.

Emission Unit: EURECYCLE, EUGLUING, EUDEGUMMING, EUDEBONDING

POLLUTION CONTROL EQUIPMENT

RTO

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. Total Organics	50% Destruction (by weight)	hourly	FGRTO	SC V.1	R 336.1901
2. NO_x	0.98 pph	hourly	FGRTO	SC V.2	40 CFR 52.21(c) and (d)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate any emission unit in FGRTO unless the RTO is installed, maintained, and operated in a satisfactory manner acceptable to the AQD District Supervisor as described in the MAP. Satisfactory operation of the RTO includes maintaining a minimum temperature of 1,400 °F and a minimum retention time of 0.5 seconds. **(R 336.1901, R 336.1910)**

2. The permittee shall not operate any emission unit in FGRTO unless a malfunction abatement plan (MAP) as described in Rule 911(2), for the regenerative thermal oxidizer, has been submitted within 45 days of permit issuance, and is implemented and maintained. The MAP shall, at a minimum, specify the following:
   a) A complete preventative maintenance program including identification of the supervisory personnel responsible for overseeing the inspection, maintenance, and repair of air-cleaning devices, a description of the items or conditions that shall be inspected, the frequency of the inspections or repairs, and an identification of the major replacement parts that shall be maintained in inventory for quick replacement.
   b) An identification of the source and air-cleaning device operating variables that shall be monitored to detect a malfunction or failure, the normal operating range of these variables, and a description of the method of monitoring or surveillance procedures.
   c) A description of the corrective procedures or operational changes that shall be taken in the event of a malfunction or failure to achieve compliance with the applicable emission limits.

If at any time the MAP fails to address or inadequately addresses an event that meets the characteristics of a malfunction, the permittee shall amend the MAP within 45 days after such an event occurs. The permittee shall also amend the MAP within 45 days, if new equipment is installed or upon request from the District Supervisor. The permittee shall submit the MAP and any amendments to the MAP to the AQD District Supervisor for review and approval. If the AQD does not notify the permittee within 90 days of submittal, the MAP or amended MAP shall be considered approved. Until an amended plan is approved, the permittee shall implement corrective procedures or operational changes to achieve compliance with all applicable emission limits. **(R 336.1901, R 336.1910, R 336.1911)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall install, calibrate, maintain and operate in a satisfactory manner, acceptable to the AQD District Supervisor, a temperature monitoring device in the combustion chamber of the thermal oxidizer to monitor and record the temperature, on a continuous basis, during operation of FGRTO. **(R 336.1901, R 336.1910, R 336.1911)**

2. The heat input capacity for FGRTO shall not exceed 10 MMBtu per hour on a fuel heat input basis. **(R 336.1901, R 336.1910, R 336.1911)**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify the total organic destruction efficiency of the RTO, by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in 40 CFR Part 60, Appendix A. An alternate method, or a modification to the approved EPA Method, may be specified in an AQD approved Test Protocol and must meet the requirements of the federal Clean Air Act, all applicable state and federal rules and regulations, and be within the authority of the AQD to make the change. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1901, R 336.1910, R 336.2001, R 336.2003, R 336.2004)**

2. Upon request of the AQD District Supervisor, the permittee shall verify the NO_x emission rate and/or visible emissions from FGRTO by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
NO_x	40 CFR Part 60, Appendix A

An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1901, R 336.1910)**

2. The permittee shall monitor and record, in a satisfactory manner, the temperature in the combustion chamber of the thermal oxidizer, on a continuous basis, during operation of RTO. Temperature data recording shall consist of measurements made at equally spaced intervals, not to exceed 15 minutes per interval. **(R 336.1901, R 336.1910)**

3. The permittee shall keep records of maintenance inspections which include the dates, results of the inspections and the dates and reasons for repairs if made. The following items shall be inspected for the FGRTO:
   a) Validation of thermocouple accuracy or recalibration of each temperature thermocouple a minimum of once every 12 months. The thermocouple can be replaced in lieu of validation.
   b) Perform a heat exchange/heat transfer media inspection a minimum of once every 18 months.
   c) Perform an inspection of the valve seals condition and verify valve timing/synchronization a minimum of once every 18 months.

   The requirement to address these items is also satisfied if a destruction efficiency test has been performed on the RTO control device within the prior 18-month period. All records shall be kept on file and made available to the Department upon request. **(R 336.1901, R 336.1910)**

4. The permittee shall conduct bypass monitoring for each bypass valve, while in operation, such that the valve or closure method cannot be opened without creating an alarm condition for which a record shall be made. Records of the bypass line that was open and the length of time the bypass was open shall be kept on file and made available to the Department upon request. **(R 336.1901, R 336.1910)**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-RTO (RTO)	40	34	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGACIDGASSCRUB
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Wet scrubber to reduce acid gas emissions from material cleaning conducted in the recycling area.

Emission Unit: EURECYCLE

POLLUTION CONTROL EQUIPMENT

Alkaline wet scrubber

I. EMISSION LIMIT(S)

NA

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate FGACIDGASSCRUB unless the alkaline wet scrubber is installed, maintained, and operated in a satisfactory manner as described in the MAP. **(R 336.1224, R 336.1225, R 336.1910)**

2. The permittee shall not operate FGACIDGASSCRUB unless a malfunction abatement plan (MAP) as described in Rule 911(2), for the alkaline wet scrubber, has been submitted within 45 days of permit issuance, and is implemented and maintained. The MAP shall, at a minimum, specify the following:
   a) A complete preventative maintenance program including identification of the supervisory personnel responsible for overseeing the inspection, maintenance, and repair of air-cleaning devices, a description of the items or conditions that shall be inspected, the frequency of the inspections or repairs, and an identification of the major replacement parts that shall be maintained in inventory for quick replacement.
   b) An identification of the source and air-cleaning device operating variables that shall be monitored to detect a malfunction or failure, the normal operating range of these variables, and a description of the method of monitoring or surveillance procedures.
   c) A description of the corrective procedures or operational changes that shall be taken in the event of a malfunction or failure to achieve compliance with the applicable emission limits.

   If at any time the MAP fails to address or inadequately addresses an event that meets the characteristics of a malfunction, the permittee shall amend the MAP within 45 days after such an event occurs. The permittee shall also amend the MAP within 45 days, if new equipment is installed or upon request from the District Supervisor. The permittee shall submit the MAP and any amendments to the MAP to the AQD District Supervisor for review and approval. If the AQD does not notify the permittee within 90 days of submittal, the MAP or amended MAP shall be considered approved. Until an amended plan is approved, the permittee shall implement corrective procedures or operational changes to achieve compliance with all applicable emission limits. **(R 336.1910, R 336.1911)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain the alkaline wet scrubber with a liquid flow rate indicator to continuously monitor and record the scrubbing liquid flow rate. **(R 336.1224, R 336.1225, R 336.1910)**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(a), R 336.1910)**

2. The permittee shall monitor and record, in a satisfactory manner, the scrubbing liquid flow rate of the alkaline wet scrubber on a continuous basis. For the purpose of this condition, "on a continuous basis" is defined as an instantaneous data point recorded at least once every 15 minutes. The permittee may record block average values for 15 minute or shorter periods calculated from all measured data values during each period. The permittee shall keep all records on file at the facility and make them available to the Department upon request. **(R 336.1224, R 336.1225, R 336.1910)**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-ACIDGASSCRUB	40	65	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGDUSTCOLLECTR
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Collection of equipment venting to several dust collectors.

Emission Unit: EULOADING, EUMELTING, EUINSPECTION, EURECYCLE, EUMANUALGRIND, EUCRUSHING

POLLUTION CONTROL EQUIPMENT

Dust Collectors (13)

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. PM	0.01 lbs/per 1,000 lbs of exhaust gas[a]	Hourly	FGDUSTCOLLECTR (Each Vent/Stack)	SC V.1	R 336.1331
2. PM10	0.39 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-01A or SV-DCS-01B)[b]	SC V.1	40 CFR 52.21(c) and (d)
3. PM2.5	0.15 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-01A or SV-DCS-01B)[b]	SC V.1	40 CFR 52.21(c) and (d)
4. PM10	0.38 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-02)	SC V.1	40 CFR 52.21(c) and (d)
5. PM2.5	0.15 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-02)	SC V.1	40 CFR 52.21(c) and (d)
6. PM10	0.19 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-02A)	SC V.1	40 CFR 52.21(c) and (d)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
7. PM2.5	0.08 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-02A)	SC V.1	40 CFR 52.21(c) and (d)
8. PM10	0.39 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-03)	SC V.1	40 CFR 52.21(c) and (d)
9. PM2.5	0.16 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-03)	SC V.1	40 CFR 52.21(c) and (d)
10. PM10	0.17 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-04)	SC V.1	40 CFR 52.21(c) and (d)
11. PM2.5	0.07 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-04)	SC V.1	40 CFR 52.21(c) and (d)
12. PM10	0.3 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-05)	SC V.1	40 CFR 52.21(c) and (d)
13. PM2.5	0.12 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-05)	SC V.1	40 CFR 52.21(c) and (d)
14. PM10	0.32 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-06)	SC V.1	40 CFR 52.21(c) and (d)
15. PM2.5	0.13 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-06)	SC V.1	40 CFR 52.21(c) and (d)
16. PM10	0.25 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-07)	SC V.1	40 CFR 52.21(c) and (d)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
17. PM2.5	0.10 pph	Hourly	FGDUSTCOLLECTR (SV-DCS-07)	SC V.1	40 CFR 52.21(c) and (d)
18. PM10	0.02 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-01)	SC V.1	40 CFR 52.21(c) and (d)
19. PM2.5	0.01 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-01)	SC V.1	40 CFR 52.21(c) and (d)
20. PM10	0.02 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-02)	SC V.1	40 CFR 52.21(c) and (d)
21. PM2.5	0.01 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-02)	SC V.1	40 CFR 52.21(c) and (d)
22. PM10	0.02 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-03)	SC V.1	40 CFR 52.21(c) and (d)
23. PM2.5	0.01 pph	Hourly	FGDUSTCOLLECTR (SV-CVHO-03)	SC V.1	40 CFR 52.21(c) and (d)

[a] Calculated on a dry gas basis
[b] Dust Collectors 1A and 1B will not operate at the same time

24. Visible emissions from any dust collector in FGDUSTCOLLECTR shall not exceed a six-minute average of 10 percent opacity. **(R 336.1301, R 336.1303, 40 CFR 52.21(c) and (d))**

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate any dust collector in FGDUSTCOLLECTR unless each dust collector is installed, maintained, and operated in a satisfactory manner as described in the MAP. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

2. The permittee shall not operate any dust collector in FGDUSTCOLLECTR unless the pressure drop across each dust collector is within the pressure drop range specified in the MAP. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

3. The permittee shall not exhaust to SV-DCS-01A and SV-DSC-01B at the same time during the operation of any emission unit in FGDUSTCOLLECTR. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

4. The permittee shall not operate FGDUSTCOLLECTR unless a malfunction abatement plan (MAP) as described in Rule 911(2), for the dust collectors, has been submitted within 45 days of permit issuance, and is implemented and maintained. The MAP shall, at a minimum, specify the following:
   a) A complete preventative maintenance program including identification of the supervisory personnel responsible for overseeing the inspection, maintenance, and repair of air-cleaning devices, a description of the items or conditions that shall be inspected, the frequency of the inspections or repairs, and an identification of the major replacement parts that shall be maintained in inventory for quick replacement.
   b) An identification of the source and air-cleaning device operating variables that shall be monitored to detect a malfunction or failure, the normal operating range of these variables, and a description of the method of monitoring or surveillance procedures.
   c) A description of the corrective procedures or operational changes that shall be taken in the event of a malfunction or failure to achieve compliance with the applicable emission limits.

   If at any time the MAP fails to address or inadequately addresses an event that meets the characteristics of a malfunction, the permittee shall amend the MAP within 45 days after such an event occurs. The permittee shall also amend the MAP within 45 days, if new equipment is installed or upon request from the District Supervisor. The permittee shall submit the MAP and any amendments to the MAP to the AQD District Supervisor for review and approval. If the AQD does not notify the permittee within 90 days of submittal, the MAP or amended MAP shall be considered approved. Until an amended plan is approved, the permittee shall implement corrective procedures or operational changes to achieve compliance with all applicable emission limits. **(R 336.1301, R 336.1331, R 336.1910, R 336.1911, 40 CFR 52.21(c) and (d))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain each dust collector in FGDUSTCOLLECTR with a continuous pressure drop indicator. The permittee shall calibrate the pressure drop indictor in a satisfactory manner acceptable to the AQD District Supervisor. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify the PM, PM10, and PM2.5 emission rate and/or visible emissions from any dust collector in FGDUSTCOLLECTR by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
PM	40 CFR Part 60, Appendix A; Part 10 of the Michigan Air Pollution Control Rules
PM10, PM2.5	40 CFR Part 60, Appendix A
Visible Emission	40 CFR Part 51, Appendix M; 40 CFR Part 60, Appendix A

   An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1301, R 336.1303, R 336.1331, R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

3. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1301, R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

4. The permittee shall record the pressure drop of each dust collector in FGDUSTCOLLECTR once per calendar week in an acceptable manner. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1301, R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

5. The permittee shall monitor each dust collector to verify it is operating properly, by taking visible emission readings for FGDUSTCOLLECTR a minimum of once per calendar week. Either a certified or non-certified reader shall take each visible emission reading during routine operating conditions. If any visible emissions (other than uncombined water vapor) are observed, the permittee shall immediately inspect the baghouse and perform any required maintenance. **(R 336.1910)**

6. The permittee shall keep, in a satisfactory manner, records of all visible emission readings for FGDUSTCOLLECTR. At a minimum, records shall include the date, time, name of observer/reader, whether the reader is certified, and status of visible emissions. The permittee shall keep all records on file at the facility and make them available to the Department upon request. **(R 336.1301, R 336.1303)**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-DCS-01A (Dust Collector 1A)	32	30	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-DCS-01B (Dust Collector 1B)	32	30	R 336.1225, 40 CFR 52.21(c) and (d)
3. SV-DCS-02 (Dust Collector 2)	32	30	R 336.1225, 40 CFR 52.21(c) and (d)
4. SV-DCS-02A (Dust Collector 2A)	32	30	R 336.1225, 40 CFR 52.21(c) and (d)
5. SV-DCS-03 (Dust Collector 3)	13	30	R 336.1225, 40 CFR 52.21(c) and (d)
6. SV-DCS-04 (Dust Collector 4)	30	30	R 336.1225, 40 CFR 52.21(c) and (d)
7. SV-DCS-05 (Dust Collector 5)	28	30	R 336.1225, 40 CFR 52.21(c) and (d)
8. SV-DCS-06 (Dust Collector 6)	32	30	R 336.1225, 40 CFR 52.21(c) and (d)
9. SV-DCS-07 (Dust Collector 7)	30	30	R 336.1225, 40 CFR 52.21(c) and (d)
10. SV-CHVO-01 (Housekeeping Vac 1)	6	1.6	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
11. SV-CHVO-02 (Housekeeping Vac 2)	6	1.6	R 336.1225, 40 CFR 52.21(c) and (d)
12. SV-CHVO-03 (Housekeeping Vac 3)	6	1.6	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGMISTELIMINTR
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Collection of equipment venting to several mist eliminators.

Emission Unit: EUSLICING, EUGRINDING, EUSQUARER

POLLUTION CONTROL EQUIPMENT

Mist Eliminators (10)

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. PM	0.005 lbs/per 1000 lbs of exhaust gas[a]	Hourly	FGMISTELIMINTR (Each Vent/Stack)	SC V.1	R 336.1331
2. PM10	0.05 pph	Hourly	FGMISTELIMINTR (Each Vent/Stack: SV-MCS-1A, SV-MCS-1B, SV-MCS-1C, SV-MCS-1D, SV-MCS-1E, SV-MCS-1F)	SC V.1	40 CFR 52.21(c) and (d)
3. PM2.5	0.02 pph	Hourly	FGMISTELIMINTR (Each Vent/Stack: SV-MCS-1A, SV-MCS-1B, SV-MCS-1C, SV-MCS-1D, SV-MCS-1E, SV-MCS-1F)	SC V.1	40 CFR 52.21(c) and (d)
4. PM10	0.10 pph	Hourly	FGMISTELIMINTR (Each Vent/Stack: SV-MCS-2A, SV-MCS-2B, SV-MCS-2C, SV-MCS-2D)	SC V.1	40 CFR 52.21(c) and (d)
5. PM2.5	0.04 pph	Hourly	FGMISTELIMINTR (Each Vent/Stack: SV-MCS-2A, SV-MCS-2B, SV-MCS-2C, SV-MCS-2D)	SC V.1	40 CFR 52.21(c) and (d)

[a] Calculated on a dry gas basis

6. Visible emissions from any mist eliminator in FGMISTELIMINTR shall not exceed a six-minute average of 5 percent opacity. **(R 336.1301, R 336.1303, R 336.1901, 40 CFR 52.21(c) and (d))**

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate any mist eliminator in FGMISTELIMINTR unless each mist eliminator is installed, maintained, and operated in a satisfactory manner as described in the MAP. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

2. The permittee shall not operate any mist eliminator in FGMISTELIMINTR unless the pressure drop across each dust collector is within the pressure drop range specified in the MAP. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

3. The permittee shall not operate FGMISTELIMINTR unless a malfunction abatement plan (MAP) as described in Rule 911(2), for the mist eliminators, has been submitted within 45 days of permit issuance, and is implemented and maintained. The MAP shall, at a minimum, specify the following:
   a) A complete preventative maintenance program including identification of the supervisory personnel responsible for overseeing the inspection, maintenance, and repair of air-cleaning devices, a description of the items or conditions that shall be inspected, the frequency of the inspections or repairs, and an identification of the major replacement parts that shall be maintained in inventory for quick replacement.
   b) An identification of the source and air-cleaning device operating variables that shall be monitored to detect a malfunction or failure, the normal operating range of these variables, and a description of the method of monitoring or surveillance procedures.
   c) A description of the corrective procedures or operational changes that shall be taken in the event of a malfunction or failure to achieve compliance with the applicable emission limits.

   If at any time the MAP fails to address or inadequately addresses an event that meets the characteristics of a malfunction, the permittee shall amend the MAP within 45 days after such an event occurs. The permittee shall also amend the MAP within 45 days, if new equipment is installed or upon request from the District Supervisor. The permittee shall submit the MAP and any amendments to the MAP to the AQD District Supervisor for review and approval. If the AQD does not notify the permittee within 90 days of submittal, the MAP or amended MAP shall be considered approved. Until an amended plan is approved, the permittee shall implement corrective procedures or operational changes to achieve compliance with all applicable emission limits. **(R 336.1301, R 336.1331, R 336.1910, R 336.1911, 40 CFR 52.21(c) and (d))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain each mist eliminator in FGMISTELIMINTR with a continuous pressure drop indicator. The permittee shall calibrate the pressure drop indictor in a satisfactory manner acceptable to the AQD District Supervisor. **(R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify the PM, PM10, and PM2.5 emission rate and/or visible emissions from FGMISTELIMINTR by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
PM	40 CFR Part 60, Appendix A; Part 10 of the Michigan Air Pollution Control Rules
PM10, PM2.5	40 CFR Part 60, Appendix A
Visible Emission	40 CFR Part 51, Appendix M; 40 CFR Part 60, Appendix A

An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1301, R 336.1303, R 336.1331, R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1301, R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

2. The permittee shall record the pressure drop of each mist eliminator in FGMISTELIMINTR once per calendar week in an acceptable manner. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1301, R 336.1331, R 336.1910, 40 CFR 52.21(c) and (d))**

3. The permittee shall monitor each mist eliminator to verify it is operating properly, by taking visible emission readings for FGMISTELIMINTR a minimum of once per calendar week. Either a certified or non-certified reader shall take each visible emission reading during routine operating conditions. If any visible emissions (other than uncombined water vapor) are observed, the permittee shall immediately inspect the baghouse and perform any required maintenance. **(R 336.1910)**

4. The permittee shall keep, in a satisfactory manner, records of all visible emission readings for FGMISTELIMINTR. At a minimum, records shall include the date, time, name of observer/reader, whether the reader is certified, and status of visible emissions. The permittee shall keep all records on file at the facility and make them available to the Department upon request. **(R 336.1301, R 336.1303)**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-MCS-1A (Mist Eliminator 1A)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-MCS-1B (Mist Eliminator 1B)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)
3. SV-MCS-1C (Mist Eliminator 1C)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)
4. SV-MCS-1D (Mist Eliminator 1D)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)
5. SV-MCS-1E (Mist Eliminator 1E)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)
6. SV-MCS-1F (Mist Eliminator 1F)	16.2	30	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
7. SV-MCS-2A (Mist Eliminator 2A)	22	30	R 336.1225, 40 CFR 52.21(c) and (d)
8. SV-MCS-2B (Mist Eliminator 2B)	22	30	R 336.1225, 40 CFR 52.21(c) and (d)
9. SV-MCS-2C (Mist Eliminator 2C)	22	30	R 336.1225, 40 CFR 52.21(c) and (d)
10. SV-MCS-2D (Mist Eliminator 2D)	22	30	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGCOOLINGTWR
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Cooling towers serving the facility and process.

Emission Unit: EUFACILITYCT, EUPROCESSCT

POLLUTION CONTROL EQUIPMENT

Drift Eliminators

I. EMISSION LIMIT(S)

NA

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. Total Dissolved Solids (TDS) Content of the Circulating Water	2,000 ppmw[b]	12-month rolling time period as determined at the end of each calendar month	FGCOOLINGTWR (Each EU)	SC VI.3	40 CFR 52.21(c) and (d)

[b] ppmw = parts per million by weight

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain each emission unit in FGCOOLINGTWR with mist/drift eliminators with a vendor-certified maximum drift rate of 0.02 percent or less. **(R 336.1910)**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify drift loss from any emission unit in FGCOOLINGTWR by testing, at owner's expense, in accordance with Department requirements. Testing shall be performed using the 2011 version of the Cooling Technology Institute's Acceptable Test Code (ATC) 140, unless the AQD approves use of an alternate method. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1910, R 336.2001, R 336.2003, R 336.2004)**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1910, 40 CFR 52.21(c) and (d))**

2. The permittee shall maintain a record of the vendor's certification required in SC IV.1, for the life of each emission unit in FGCOOLINGTWR. **(R 336.1910, R 336.2810)**

3. The permittee shall separately monitor and record the following for each emission unit in FGCOOLINGTWR: **(R 336.1910, 40 CFR 52.21(c) & (d))**

   a) On a monthly basis, parameters needed to determine the TDS content of the circulating water.

   b) On a monthly basis, parameters needed to determine the water recirculation rate.

4. The permittee shall separately calculate and keep records of the TDS in the circulating water for each emission unit in FGCOOLINGTWR on a monthly basis. **(R 336.1910, 40 CFR 52.21(c) and (d))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-FACILITYCT[c] (Facility Cooling Tower)	142	50	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-PROCESSCT[d] (Process Cooling Tower)	142	44	R 336.1225, 40 CFR 52.21(c) and (d)
[c] This stack ID represents 32 identical cells/stacks in EUFACILITYCT. [d] This stack ID represents 32 identical cells/stacks in EUPROCESSCT.			

IX. OTHER REQUIREMENT(S)

NA

Footnotes:

[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGEMGEN
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Emergency generator engines and a fire pump. Engines are subject to NSPS IIII.

Emission Unit: EUEMGEN1, EUEMGEN2, EUEMGEN3, EUEMGEN4, EUFIREPUMP

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. NMHC + NO_x	6.4 g/kW-hr	Hourly	Each Emergency Generator	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 2 of Appendix I of 40 CFR 1039
2. CO	3.5 g/kW-hr	Hourly	Each Emergency Generator	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 2 of Appendix I of 40 CFR 1039
3. PM	0.2 g/kW-hr	Hourly	Each Emergency Generator	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 2 of Appendix I of 40 CFR 1039
4. NMHC + NO_x	4.0 g/kW-hr	Hourly	EUFIREPUMP	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 3 of Appendix I of 40 CFR 1039
5. CO	3.5 g/kW-hr	Hourly	EUFIREPUMP	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 3 of Appendix I of 40 CFR 1039
6. PM	0.2 g/kW-hr	Hourly	EUFIREPUMP	SC V.1, SC VI.2	40 CFR 60.4205(b), 40 CFR 60.4202, Table 3 of Appendix I of 40 CFR 1039
7. NO_x	1.47 pph	Hourly	Each Emergency Generator	SC V.2	40 CFR 52.21(c) and (d)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
8. NO_x	0.12 pph	Hourly	EUFIREPUMP	SC V.2	40 CFR 52.21(c) and (d)
9. PM10	0.17 pph	Hourly	Each Emergency Generator	SC V.2	40 CFR 52.21(c) and (d)
10. PM10	0.019 pph	Hourly	EUFIREPUMP	SC V.2	40 CFR 52.21(c) and (d)
11. PM2.5	0.11 pph	Hourly	Each Emergency Generator	SC V.2	40 CFR 52.21(c) and (d)
12. PM2.5	0.0126 pph	Hourly	EUFIREPUMP	SC V.2	40 CFR 52.21(c) and (d)

II. MATERIAL LIMIT(S)

1. The permittee shall burn only diesel fuel, in FGEMGEN with the maximum sulfur content of 15 ppm (0.0015 percent) by weight, and a minimum Cetane index of 40 or a maximum aromatic content of 35 volume percent. **(40 CFR 60.4207, 40 CFR 1090.305)**

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate any engine in FGEMGEN for more than 500 hours per year based on a 12-month rolling time period as determined at the end of each calendar month. The 500 hours includes the hours for the purpose of necessary maintenance checks and readiness testing as described in SC III.2. **(R 336.1225, R 336.1702(a), 40 CFR 52.21(c) & (d))**

2. The permittee may operate any engine in FGEMGEN for no more than 100 hours per calendar year for the purpose of necessary maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or the insurance company associated with the engine. The permittee may petition the Department for approval of additional hours to be used for maintenance checks and readiness testing. A petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency internal combustion engines beyond 100 hours per calendar year. **(40 CFR 60.4211(f)(2))**

3. The permittee may operate any engine in FGEMGEN up to 50 hours per calendar year in non-emergency situations, but those 50 hours are counted as part of the 100 hours per calendar year provided for maintenance and testing as provided in 40 CFR 60.4211(f)(2). Except as provided in 40 CFR 60.4211(f)(3)(i), the 50 hours per calendar year for non-emergency situations cannot be used for peak shaving or non-emergency demand

response, or to generate income for a facility to an electric grid or otherwise supply power as part of a financial arrangement with another entity. **(40 CFR 60.4211(f)(3))**

4. If the permittee purchased a certified engine, according to procedures specified in 40 CFR Part 60, Subpart IIII, for the same model year, the permittee shall meet the following requirements for all engines in FGEMGEN.

   a) Operate and maintain the certified engine and control device according to the manufacturer's emission-related written instructions,

   b) Change only those emission-related settings that are permitted by the manufacturer, and

   c) Meet the requirements as specified in 40 CFR 1068, as they apply to the engine.

   If you do not operate and maintain the certified engine and control device according to the manufacturer's emission-related written instructions, the engine will be considered a non-certified engine. **(40 CFR 60.4211(a) & (c))**

5. If the permittee purchased a non-certified engine or a certified engine operating in a non-certified manner, the permittee shall keep a maintenance plan for all engines in FGEMGEN and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions. **(40 CFR 60.4211(g)(3))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain each engine in FGEMGEN with non-resettable hours meters to track the operating hours. **(R 336.1225, 40 CFR 60.4209)**

2. The maximum rated power output of EUEMGEN1, EUEMGEN2, EUEMGEN3, and EUEMGEN4 shall not exceed 2,923 HP (2,180 kW), as certified by the equipment manufacturer. **(R 336.1225, R 336.1702(a), 40 CFR 60.4202, 40 CFR 60.4205, 40 CFR 1039, 40 CFR 1042)**

3. The maximum rated power output of EUFIREPUMP shall not exceed 350 HP (261 kW), as certified by the equipment manufacturer. **(R 336.1225, R 336.1702(a), 40 CFR 60.4202, 40 CFR 60.4205, 40 CFR 1039, 40 CFR 1042)**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. If any engine in FGEMGEN is not installed, configured, operated, and maintained according to the manufacturer's emission-related written instructions, or the permittee changes emission-related settings in a way that is not permitted by the manufacturer, the permittee must demonstrate compliance as follows:

   a) Conduct an initial performance test to demonstrate compliance with the applicable emission standards within 1 year of startup, or within 1 year after an engine and control device is no longer installed, configured, operated, and maintained in accordance with the manufacturer's emission-related written instructions, or within 1 year after you change emission-related settings in a way that is not permitted by the manufacturer.

   b) If a performance test is required, the performance tests shall be conducted according to 40 CFR 60.4212.

   c) Conduct subsequent performance testing every 8,760 hours of engine operation or every 3 years thereafter, whichever comes first, to demonstrate compliance with the applicable emission standards.

   No less than 30 days prior to testing, a complete test plan shall be submitted to the AQD. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(40 CFR 60.4211(g)(3), 40 CFR 60.4212)**

2. Upon request of the AQD District Supervisor, the permittee shall verify the NO_x, PM10, and PM2.5 emission rate from each emission unit in FGEMGEN by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
NO_x	40 CFR Part 60, Appendix A
PM10, PM2.5	40 CFR Part 60, Appendix A

An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1301, R 336.1303, R 336.1331, R 336.1901, R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1225, 40 CFR 52.21 (c) & (d), 40 CFR Part 60, Subpart IIII)**

2. The permittee shall keep, in a satisfactory manner, the following records for each engine in FGEMGEN:

   a) For a certified engine: The permittee shall keep records of the manufacturer certification documentation.

   b) For an uncertified engine: The permittee shall keep records of testing required in SC V.1.

   The permittee shall keep all records on file and make them available to the Department upon request. **(40 CFR 60.4211)**

3. The permittee shall keep, in a satisfactory manner, the following records of maintenance activity for each engine in FGEMGEN:

   a) For a certified engine: The permittee shall keep records of the manufacturer's emission-related written instructions, and records demonstrating that the engine has been maintained according to those instructions, as specified in SC III.4.

   b) For an uncertified engine: The permittee shall keep records of a maintenance plan, as required by SC III.5, and maintenance activities.

   The permittee shall keep all records on file and make them available to the Department upon request. **(40 CFR 60.4211)**

4. The permittee shall monitor and record, the total hours of operation for each engine in FGEMGEN on a monthly and 12-month rolling time period basis, and the hours of operation during emergency and non-emergency service that are recorded through the non-resettable hour meter for each engine in FGEMGEN, on a calendar year basis, in a manner acceptable to the AQD District Supervisor. The permittee shall document how many hours are spent for emergency operation of each FGEMGEN, including what classified the operation as emergency and how many hours are spent for non-emergency operation. **(40 CFR 60.4211, 40 CFR 60.4214)**

5. The permittee shall keep, in a satisfactory manner, fuel supplier certification records or fuel sample test data, for each delivery of diesel fuel oil used in each engine in FGEMGEN, demonstrating that the fuel meets the requirement of 40 CFR 1090.305. The certification or test data shall include the name of the oil supplier or laboratory, the sulfur content, and cetane index or aromatic content of the fuel oil. **(40 CFR 60.4207(b), 40 CFR 1090.305)**

VII. REPORTING

1. The permittee shall submit a notification specifying whether any engine in FGEMGEN will be operated in a certified or a non-certified manner to the AQD District Supervisor, in writing, within 30 days following the initial startup of the engine and within 30 days of switching the manner of operation. **(40 CFR Part 60, Subpart IIII)**

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-EMGEN1 (Emergency Gen 1)	16	15	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-EMGEN2 (Emergency Gen 2)	16	15	R 336.1225, 40 CFR 52.21(c) and (d)
3. SV-EMGEN3 (Emergency Gen 3)	16	15	R 336.1225, 40 CFR 52.21(c) and (d)
4. SV-EMGEN4 (Emergency Gen 4)	19	15	R 336.1225, 40 CFR 52.21(c) and (d)
5. SV-FIREPUMP (Fire Pump)	19	25	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

1. The permittee shall comply with the provisions of the federal Standards of Performance for New Stationary Sources as specified in 40 CFR Part 60, Subparts A and IIII, as they apply to each engine in FGEMGEN. **(40 CFR Part 60, Subparts A & IIII, 40 CFR 63.6590(c))**

2. The permittee shall comply with the provisions of the National Emission Standards for Hazardous Air Pollutants as specified in 40 CFR Part 63, Subparts A and ZZZZ, as they apply to each engine in FGEMGEN. **(40 CFR Part 63, Subparts A & ZZZZ, 40 CFR 63.6585)**

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGHVAC
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Collection of natural gas combustion units (< 3.0 mmbtu/hr each) that serve the facility.

Emission Unit: EUHVAC-RTU, EUHVAC-AHU, EUHVAC-RTH, EUHVAC-GUH, EUHVAC-DOA, EUHVAC-MAU

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. NO_x	2.37 pph	Hourly	EUHVAC-RTU	SC V.1	40 CFR 52.21(c) and (d)
2. NO_x	4.78 pph	Hourly	EUHVAC-AHU	SC V.1	40 CFR 52.21(c) and (d)
3. NO_x	0.10 pph	Hourly	EUHVAC-RTH	SC V.1	40 CFR 52.21(c) and (d)
4. NO_x	0.06 pph	Hourly	EUHVAC-GUH	SC V.1	40 CFR 52.21(c) and (d)
5. NO_x	2.35 pph	Hourly	EUHVAC-DOA	SC V.1	40 CFR 52.21(c) and (d)
6. NO_x	0.38 pph	Hourly	EUHVAC-MAU	SC V.1	40 CFR 52.21(c) and (d)

II. MATERIAL LIMIT(S)

1. The permittee shall burn only natural gas in FGHVAC. **(R 336.1224, R 336.1225, R 336.1702(a), 40 CFR 52.21(c) and (d))**

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The heat input capacity of EUHVAC-RTU shall not exceed a combined maximum of 24.18 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

2. The heat input capacity of EUHVAC-AHU shall not exceed a combined maximum of 48.73 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

3. The heat input capacity of EUHVAC-RTH shall not exceed a combined maximum of 1.0 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

4. The heat input capacity of EUHVAC-GUH shall not exceed a combined maximum of 0.66 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

5. The heat input capacity of EUHVAC-DOA shall not exceed a combined maximum of 24 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

6. The heat input capacity of EUHVAC-MAU shall not exceed a combined maximum of 3.92 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify the NO_x emission rate from each emission unit in FGHVAC by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
NO_x	40 CFR Part 60, Appendix A

An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1301, R 336.1303, R 336.1331, R 336.1901, R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1205(1)(a) and (3), 40 CFR 52.21(c) and (d))**

2. The permittee shall keep, in a satisfactory manner acceptable to the AQD District Supervisor, records of the size of all emission units in FGHVAC on file at the facility and make them available to the Department upon request. **(R 336.1205(1)(a) and (3), 40 CFR 52.21(c) and (d))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-RTU01 (Rooftop Unit 1)	11.8	42	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-RTU02 (Rooftop Unit 2)	11.8	42	R 336.1225, 40 CFR 52.21(c) and (d)
3. SV-RTU03 (Rooftop Unit 3)	11.8	42.3	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
4. SV-RTU04 (Rooftop Unit 4)	11.8	42.3	R 336.1225, 40 CFR 52.21(c) and (d)
5. SV-RTU05 (Rooftop Unit 5)	11.8	42.3	R 336.1225, 40 CFR 52.21(c) and (d)
6. SV-RTU06 (Rooftop Unit 6)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
7. SV-RTU07 (Rooftop Unit 7)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
8. SV-RTU08 (Rooftop Unit 8)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
9. SV-RTU09 (Rooftop Unit 9)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
10. SV-RTU10 (Rooftop Unit 10)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
11. SV-RTU11 (Rooftop Unit 11)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
12. SV-RTU12 (Rooftop Unit 12)	11.8	37	R 336.1225, 40 CFR 52.21(c) and (d)
13. SV-RTU13 (Rooftop Unit 13)	11.8	37	R 336.1225, 40 CFR 52.21(c) and (d)
14. SV-RTU14 (Rooftop Unit 14)	11.8	49.3	R 336.1225, 40 CFR 52.21(c) and (d)
15. SV-RTU15 (Rooftop Unit 15)	11.8	49.3	R 336.1225, 40 CFR 52.21(c) and (d)
16. SV-RTU16 (Rooftop Unit 16)	11.8	49.3	R 336.1225, 40 CFR 52.21(c) and (d)
17. SV-RTU17 (Rooftop Unit 17)	11.8	49.3	R 336.1225, 40 CFR 52.21(c) and (d)
18. SV-RTU18 (Rooftop Unit 18)	11.8	39.5	R 336.1225, 40 CFR 52.21(c) and (d)
19. SV-RTU19 (Rooftop Unit 19)	11.8	42.6	R 336.1225, 40 CFR 52.21(c) and (d)
20. SV-DOAS01 (Outside Air Unit 1)	11.8	43.	R 336.1225, 40 CFR 52.21(c) and (d)
21. SV-DOAS02 (Outside Air Unit 2)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
22. SV-DOAS03 (Outside Air Unit 3)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
23. SV-DOAS04 (Outside Air Unit 4)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
24. SV-DOAS05 (Outside Air Unit 5)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
25. SV-DOAS06 (Outside Air Unit 6)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
26. SV-DOAS07 (Outside Air Unit 7)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
27. SV-DOAS08 (Outside Air Unit 8)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
28. SV-DOAS09 (Outside Air Unit 9)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
29. SV-DOAS10 (Outside Air Unit 10)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
30. SV-DOAS11 (Outside Air Unit 11)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
31. SV-DOAS12 (Outside Air Unit 12)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
32. SV-DOAS13 (Outside Air Unit 13)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
33. SV-DOAS14 (Outside Air Unit 14)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
34. SV-DOAS15 (Outside Air Unit 15)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
35. SV-DOAS16 (Outside Air Unit 16)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
36. SV-DOAS17 (Outside Air Unit 17)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
37. SV-DOAS18 (Outside Air Unit 18)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
38. SV-DOAS19 (Outside Air Unit 19)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
39. SV-DOAS20 (Outside Air Unit 20)	11.8	43	R 336.1225, 40 CFR 52.21(c) and (d)
40. SV-MAU01 (Make Up Air Unit 1)	5.9	58	R 336.1225, 40 CFR 52.21(c) and (d)
41. SV-MAU02 (Make Up Air Unit 2)	5.9	58	R 336.1225, 40 CFR 52.21(c) and (d)
42. SV-MAU03 (Make Up Air Unit 3)	5.9	37	R 336.1225, 40 CFR 52.21(c) and (d)
43. SV-MAU04 (Make Up Air Unit 4)	5.9	39	R 336.1225, 40 CFR 52.21(c) and (d)
44. SV-AHU01 (Air Handling Unit 1)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
45. SV-AHU02 (Air Handling Unit 2)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
46. SV-AHU03 (Air Handling Unit 3)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
47. SV-AHU04 (Air Handling Unit 4)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
48. SV-AHU05 (Air Handling Unit 5)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
49. SV-AHU06 (Air Handling Unit 6)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
50. SV-AHU07 (Air Handling Unit 7)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
51. SV-AHU08 (Air Handling Unit 8)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
52. SV-AHU09 (Air Handling Unit 9)	81.1	35	R 336.1225, 40 CFR 52.21(c) and (d)
53. SV-AHU10 (Air Handling Unit 10)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
54. SV-AHU11 (Air Handling Unit 11)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
55. SV-AHU12 (Air Handling Unit 12)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
56. SV-AHU13 (Air Handling Unit 13)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
57. SV-AHU14 (Air Handling Unit 14)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
58. SV-AHU15 (Air Handling Unit 15)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
59. SV-AHU16 (Air Handling Unit 16)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
60. SV-AHU17 (Air Handling Unit 17)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
61. SV-AHU18 (Air Handling Unit 18)	58.7	35	R 336.1225, 40 CFR 52.21(c) and (d)
62. SV-AHU19 (Air Handling Unit 19)	11.8	56	R 336.1225, 40 CFR 52.21(c) and (d)
63. SV-AHU20 (Air Handling Unit 20)	11.8	56	R 336.1225, 40 CFR 52.21(c) and (d)
64. SV-AHU21 (Air Handling Unit 21)	11.8	56	R 336.1225, 40 CFR 52.21(c) and (d)
65. SV-AHU22 (Air Handling Unit 22)	11.8	56	R 336.1225, 40 CFR 52.21(c) and (d)
66. SV-AHU25 (Air Handling Unit 25)	11.8	56	R 336.1225, 40 CFR 52.21(c) and (d)
67. SV-RTH01 (Rooftop Heater 1)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
68. SV-RTH02 (Rooftop Heater 2)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
69. SV-RTH03 (Rooftop Heater 3)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
70. SV-RTH04 (Rooftop Heater 4)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
71. SV-RTH05 (Rooftop Heater 5)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
72. SV-RTH06 (Rooftop Heater 6)	5.1	12	R 336.1225, 40 CFR 52.21(c) and (d)
73. SV-RTH07 (Rooftop Heater 7)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
74. SV-RTH08 (Rooftop Heater 8)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
75. SV-RTH09 (Rooftop Heater 9)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
76. SV-RTH10 (Rooftop Heater 10)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
77. SV-GUH1 (Gas Unit Heater 1)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
78. SV-GUH2 (Gas Unit Heater 2)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
79. SV-GUH3 (Gas Unit Heater 3)	3.9	12	R 336.1225, 40 CFR 52.21(c) and (d)
80. SV-GUH4 (Gas Unit Heater 4)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
81. SV-GUH5 (Gas Unit Heater 5)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
82. SV-GUH6 (Gas Unit Heater 6)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
83. SV-GUH7 (Gas Unit Heater 7)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
84. SV-GUH8 (Gas Unit Heater 8)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
85. SV-GUH9 (Gas Unit Heater 9)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
86. SV-GUH10 (Gas Unit Heater 10)	3.9	10	R 336.1225, 40 CFR 52.21(c) and (d)
87. SV-GUH11 (Gas Unit Heater 11)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
88. SV-GUH12 (Gas Unit Heater 12)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
89. SV-GUH13 (Gas Unit Heater 13)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
90. SV-GUH14 (Gas Unit Heater 14)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
91. SV-GUH15 (Gas Unit Heater 15)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
92. SV-GUH16 (Gas Unit Heater 16)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
93. SV-GUH17 (Gas Unit Heater 17)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
94. SV-GUH18 (Gas Unit Heater 18)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
95. SV-GUH10 (Gas Unit Heater 19)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
96. SV-GUH20 (Gas Unit Heater 20)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
97. SV-GUH21 (Gas Unit Heater 21)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)
98. SV-GUH22 (Gas Unit Heater 22)	3.9	55	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGBOILERS
FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Three natural gas fired boilers.

Emission Unit: EUBOILER1, EUBOILER2, EUBOILER3

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. NO_x	0.78 pph	Hourly	FGBOILERS (Each Boiler)	SC V.1	40 CFR 52.21(c) and (d)
2. PM10	0.06 pph	Hourly	FGBOILERS (Each Boiler)	SC V.1	40 CFR 52.21(c) and (d)
3. PM2.5	0.06 pph	Hourly	FGBOILERS (Each Boiler)	SC V.1	40 CFR 52.21(c) and (d)

II. MATERIAL LIMIT(S)

1. The permittee shall burn only natural gas in FGBOILERS. **(R 336.1225, R 336.1702(a))**

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall not operate no more than two boilers at any time, between EUBOILER1, EUBOILER2, EUBOILER3. **(R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The heat input capacity of EUBOILER1 shall not exceed a maximum of 8.0 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

2. The heat input capacity of EUBOILER2 shall not exceed a maximum of 8.0 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

3. The heat input capacity of EUBOILER3 shall not exceed a maximum of 8.0 MM BTU per hour on a fuel heat input basis. **(R 336.1205(1)(a) and (3), R 336.1225, R 336.1702, 40 CFR 52.21(c) and (d))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. Upon request of the AQD District Supervisor, the permittee shall verify the NO_x, PM10, and PM2.5 emission rate from each emission unit in FGBOILERS by testing at owner's expense, in accordance with Department requirements. Testing shall be performed using an approved EPA Method listed in the table below.

Pollutant	Test Method Reference
NO_x	40 CFR Part 60, Appendix A
PM10, PM2.5	40 CFR Part 60, Appendix A

An alternate method, or a modification to the approved EPA Method, may be specified in an AQD-approved Test Protocol. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD Technical Programs Unit and District Office. The AQD must approve the final plan prior to testing, including any modifications to the method in the test protocol that are proposed after initial submittal. The permittee must submit a complete report of the test results to the AQD Technical Programs Unit and District Office within 60 days following the last date of the test. **(R 336.1301, R 336.1303, R 336.1331, R 336.1901, R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21(c) and (d))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1205(1)(a) and (3), 40 CFR 52.21(c) and (d))**

2. The permittee shall keep, in a satisfactory manner acceptable to the AQD District Supervisor, records of the size of all boilers on file at the facility and make them available to the Department upon request. **(R 336.1205(1)(a) and (3), 40 CFR 52.21(c) and (d))**

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTION(S)

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter / Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-BOILER01 (Boiler 1)	16	41	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-BOILER02 (Boiler 2)	16	41	R 336.1225, 40 CFR 52.21(c) and (d)
3. SV-BOILER03 (Boiler 3)	16	41	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

1. The permittee shall comply with all provisions of the federal Standards of Performance for New Stationary Sources as specified in 40 CFR Part 60 Subparts A and Dc, as they apply to each boiler in FGBOILERS. **(40 CFR Part 60 Subparts A & Dc)**

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FGFACILITY CONDITIONS

DESCRIPTION

The following conditions apply source-wide to all process equipment including equipment covered by other permits, grand-fathered equipment, and exempt equipment.

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring / Testing Method	Underlying Applicable Requirements
1. NO_x	89.0 tpy	12-month rolling time period as determined at the end of each calendar month	FGFACILITY	SC VI.2 SC VI.3	R 336.205(1)(a) & (3)

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

NA

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The rated output of the engines in FGEMGEN shall not exceed maximum outputs listed in FGEMGEN, SC IV.2-3. **(R 336.1205(1)(a) and (3))**

2. The heat input capacity of the HVAC units in FGHVAC shall not exceed maximum fuel heat inputs listed in FGHVAC, SC IV.1-6. **(R 336.1205(1)(a) and (3))**

3. The heat input capacity of the boilers in FGBOILERS shall not exceed maximum fuel heat inputs listed in FGBOILERS, SC IV.1-3. **(R 336.1205(1)(a) and (3))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor and make them available by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition. **(R 336.1205(1)(a) and (3))**

2. The permittee shall keep, in a satisfactory manner, monthly and previous 12-month NO_x emission calculation records for FGFACILITY, as required by SC I.1. The permittee shall calculate the emissions based on the heat input capacity of each emission unit and the amount of natural gas used in FGHVAC and FGBOILERS,

and the output of each emission unit and hours of operation in FGEMGEN. The permittee shall keep all records on file and make them available to the Department upon request. **(R 336.1205(1)(a) and (3), 40 CFR 52.21(c) and (d)))**

VII. REPORTING

1. Within 30 days after completion of the installation, construction, reconstruction, relocation, or modification authorized by this Permit to Install, the permittee or the authorized agent pursuant to Rule 204, shall notify the AQD District Supervisor, in writing, of the completion of the activity. Completion of the installation, construction, reconstruction, relocation, or modification is considered to occur not later than commencement of trial operation of any emission unit (whether stand-alone or within flexible group described in this permit). **(R 336.1201(7)(a))**

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

Footnotes:
[1] This condition is state only enforceable and was established pursuant to Rule 201(1)(b).