

**MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY
AIR QUALITY DIVISION**

EFFECTIVE DATE: November 10, 2014

REVISION DATE: September 4, 2018

ISSUED TO:

LAMBDA ENERGY RESOURCES, LLC – KALKASKA GAS PLANT

State Registration Number (SRN): B4292

LOCATED AT:

1080 Prough Road SW, Kalkaska, Kalkaska County, Michigan 49646

RENEWABLE OPERATING PERMIT

Permit Number: MI-ROP-B4292-2014a

Expiration Date: November 10, 2019

Administratively Complete ROP Renewal Application Due Between:
May 10, 2018 and May 10, 2019

This Renewable Operating Permit (ROP) is issued in accordance with and subject to Section 5506(3) of Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451). Pursuant to Michigan Air Pollution Control Rule 210(1), this ROP constitutes the permittee's authority to operate the stationary source identified above in accordance with the general conditions, special conditions and attachments contained herein. Operation of the stationary source and all emission units listed in the permit are subject to all applicable future or amended rules and regulations pursuant to Act 451 and the federal Clean Air Act.

SOURCE-WIDE PERMIT TO INSTALL

Permit Number: MI-PTI-B4292-2014a

This Permit to Install (PTI) is issued in accordance with and subject to Section 5505(5) of Act 451. Pursuant to Michigan Air Pollution Control Rule 214a, the terms and conditions herein, identified by the underlying applicable requirement citation of Rule 201(1)(a), constitute a federally enforceable PTI. The PTI terms and conditions do not expire and remain in effect unless the criteria of Rule 201(6) are met. Operation of all emission units identified in the PTI is subject to all applicable future or amended rules and regulations pursuant to Act 451 and the federal Clean Air Act.

Michigan Department of Environmental Quality

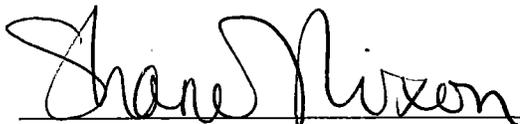

Shane Nixon, Cadillac District Supervisor

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AUTHORITY AND ENFORCEABILITY

For the purpose of this permit, the **permittee** is defined as any person who owns or operates an emission unit at a stationary source for which this permit has been issued. The **department** is defined in Rule 104(d) as the Director of the Michigan Department of Environmental Quality (MDEQ) or his or her designee.

The permittee shall comply with all specific details in the permit terms and conditions and the cited underlying applicable requirements. All terms and conditions in this ROP are both federally enforceable and state enforceable unless otherwise footnoted. Certain terms and conditions are applicable to most stationary sources for which an ROP has been issued. These general conditions are included in Part A of this ROP. Other terms and conditions may apply to a specific emission unit, several emission units which are represented as a flexible group, or the entire stationary source which is represented as a Source-Wide group. Special conditions are identified in Parts B, C, D and/or the appendices.

In accordance with Rule 213(2)(a), all underlying applicable requirements will be identified for each ROP term or condition. All terms and conditions that are included in a PTI, are streamlined or subsumed, or are state only enforceable will be noted as such.

In accordance with Section 5507 of Act 451, the permittee has included in the ROP application a compliance certification, a schedule of compliance, and a compliance plan. For applicable requirements with which the source is in compliance, the source will continue to comply with these requirements. For applicable requirements with which the source is not in compliance, the source will comply with the detailed schedule of compliance requirements that are incorporated as an appendix in this ROP. Furthermore, for any applicable requirements effective after the date of issuance of this ROP, the stationary source will meet the requirements on a timely basis, unless the underlying applicable requirement requires a more detailed schedule of compliance.

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

A. GENERAL CONDITIONS

Permit Enforceability

- All conditions in this permit are both federally enforceable and state enforceable unless otherwise noted. **(R 336.1213(5))**
- Those conditions that are hereby incorporated in a state-only enforceable Source-Wide PTI pursuant to Rule 201(2)(d) are designated by footnote one. **(R 336.1213(5)(a), R 336.1214a(5))**
- Those conditions that are hereby incorporated in federally enforceable Source-Wide PTI pursuant to Rule 201(2)(c) are designated by footnote 2. **(R 336.1213(5)(b), R 336.1214a(3))**

General Provisions

1. The permittee shall comply with all conditions of this ROP. Any ROP noncompliance constitutes a violation of Act 451, and is grounds for enforcement action, for ROP revocation or revision, or for denial of the renewal of the ROP. All terms and conditions of this ROP that are designated as federally enforceable are enforceable by the Administrator of the United States Environmental Protection Agency (USEPA) and by citizens under the provisions of the federal Clean Air Act (CAA). Any terms and conditions based on applicable requirements which are designated as "state-only" are not enforceable by the USEPA or citizens pursuant to the CAA. **(R 336.1213(1)(a))**
2. It shall not be a defense for the permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this ROP. **(R 336.1213(1)(b))**
3. This ROP may be modified, revised, or revoked for cause. The filing of a request by the permittee for a permit modification, revision, or termination, or a notification of planned changes or anticipated noncompliance does not stay any ROP term or condition. This does not supersede or affect the ability of the permittee to make changes, at the permittee's own risk, pursuant to Rule 215 and Rule 216. **(R 336.1213(1)(c))**
4. The permittee shall allow the department, or an authorized representative of the department, upon presentation of credentials and other documents as may be required by law and upon stating the authority for and purpose of the investigation, to perform any of the following activities: **(R 336.1213(1)(d))**
 - a. Enter, at reasonable times, a stationary source or other premises where emissions-related activity is conducted or where records must be kept under the conditions of the ROP.
 - b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of the ROP.
 - c. Inspect, at reasonable times, any of the following:
 - i. Any stationary source.
 - ii. Any emission unit.
 - iii. Any equipment, including monitoring and air pollution control equipment.
 - iv. Any work practices or operations regulated or required under the ROP.
 - d. As authorized by Section 5526 of Act 451, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the ROP or applicable requirements.

5. The permittee shall furnish to the department, within a reasonable time, any information the department may request, in writing, to determine whether cause exists for modifying, revising, or revoking the ROP or to determine compliance with this ROP. Upon request, the permittee shall also furnish to the department copies of any records that are required to be kept as a term or condition of this ROP. For information which is claimed by the permittee to be confidential, consistent with the requirements of the 1976 PA 442, MCL §15.231 et seq., and known as the Freedom of Information Act, the person may also be required to furnish the records directly to the USEPA together with a claim of confidentiality. **(R 336.1213(1)(e))**
6. A challenge by any person, the Administrator of the USEPA, or the department to a particular condition or a part of this ROP shall not set aside, delay, stay, or in any way affect the applicability or enforceability of any other condition or part of this ROP. **(R 336.1213(1)(f))**
7. The permittee shall pay fees consistent with the fee schedule and requirements pursuant to Section 5522 of Act 451. **(R 336.1213(1)(g))**
8. This ROP does not convey any property rights or any exclusive privilege. **(R 336.1213(1)(h))**

Equipment & Design

9. Any 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)**
10. Any air cleaning device shall be installed, maintained, and operated in a satisfactory manner and in accordance with the Michigan Air Pollution Control rules and existing law. **(R 336.1910)**

Emission Limits

11. Except as provided in Subrules 2, 3, and 4 of Rule 301, states in part; "a person shall not cause or permit to be discharged into the outer air from a process or process equipment a visible emission of a density greater than the most stringent of Rule 301(1)(a) or (b) unless otherwise specified in this ROP." The grading of visible emissions shall be determined in accordance with Rule 303. **(R 336.1301(1) in pertinent part):**
 - a. A 6-minute average of 20 percent opacity, except for one 6-minute average per hour of not more than 27 percent opacity.
 - b. A limit specified by an applicable federal new source performance standard.
12. The permittee shall not cause or permit the emission of an air contaminant or water vapor in quantities that cause, alone or in reaction with other air contaminants, either of the following:
 - a. Injurious effects to human health or safety, animal life, plant life of significant economic value, or property.¹ **(R 336.1901(a))**
 - b. Unreasonable interference with the comfortable enjoyment of life and property.¹ **(R 336.1901(b))**

Testing/Sampling

13. The department may require the owner or operator of any source of an air contaminant to conduct acceptable performance tests, at the owner's or operator's expense, in accordance with Rule 1001 and Rule 1003, under any of the conditions listed in Rule 1001(1). **(R 336.2001)**
14. Any required performance testing shall be conducted in accordance with Rule 1001(2), Rule 1001(3) and Rule 1003. **(R 336.2001(2), R 336.2001(3), R 336.2003(1))**

15. Any required test results shall be submitted to the Air Quality Division (AQD) in the format prescribed by the applicable reference test method within 60 days following the last date of the test. **(R 336.2001(4))**

Monitoring/Recordkeeping

16. Records of any periodic emission or parametric monitoring required in this ROP shall include the following information specified in Rule 213(3)(b)(i), where appropriate **(R 336.1213(3)(b))**:
- The date, location, time, and method of sampling or measurements.
 - The dates the analyses of the samples were performed.
 - The company or entity that performed the analyses of the samples.
 - The analytical techniques or methods used.
 - The results of the analyses.
 - The related process operating conditions or parameters that existed at the time of sampling or measurement.
17. All required monitoring data, support information and all reports, including reports of all instances of deviation from permit requirements, shall be kept and furnished to the department upon request for a period of not less than 5 years from the date of the monitoring sample, measurement, report or application. Support information includes all calibration and maintenance records and all original strip-chart recordings, or other original data records, for continuous monitoring instrumentation and copies of all reports required by the ROP. **(R 336.1213(1)(e), R 336.1213(3)(b)(ii))**

Certification & Reporting

18. Except for the alternate certification schedule provided in Rule 213(3)(c)(iii)(B), any document required to be submitted to the department as a term or condition of this ROP shall contain an original certification by a Responsible Official which states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. **(R 336.1213(3)(c))**
19. A Responsible Official shall certify to the appropriate AQD District Office and to the USEPA that the stationary source is and has been in compliance with all terms and conditions contained in the ROP except for deviations that have been or are being reported to the appropriate AQD District Office pursuant to Rule 213(3)(c). This certification shall include all the information specified in Rule 213(4)(c)(i) through (v) and shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the certification are true, accurate, and complete. The USEPA address is: USEPA, Air Compliance Data - Michigan, Air and Radiation Division, 77 West Jackson Boulevard, Chicago, Illinois 60604. **(R 336.1213(4)(c))**
20. The certification of compliance shall be submitted annually for the term of this ROP as detailed in the special conditions, or more frequently if specified in an applicable requirement or in this ROP. **(R 336.1213(4)(c))**
21. The permittee shall promptly report any deviations from ROP requirements and certify the reports. The prompt reporting of deviations from ROP requirements is defined in Rule 213(3)(c)(ii) as follows, unless otherwise described in this ROP. **(R 336.1213(3)(c))**
- For deviations that exceed the emissions allowed under the ROP, prompt reporting means reporting consistent with the requirements of Rule 912 as detailed in Condition 25. All reports submitted pursuant to this paragraph shall be promptly certified as specified in Rule 213(3)(c)(iii).
 - For deviations which exceed the emissions allowed under the ROP and which are not reported pursuant to Rule 912 due to the duration of the deviation, prompt reporting means the reporting of all deviations in the semiannual reports required by Rule 213(3)(c)(i). The report shall describe reasons for each deviation and the actions taken to minimize or correct each deviation.
 - For deviations that do not exceed the emissions allowed under the ROP, prompt reporting means the reporting of all deviations in the semiannual reports required by Rule 213(3)(c)(i). The report shall describe the reasons for each deviation and the actions taken to minimize or correct each deviation.

22. For reports required pursuant to Rule 213(3)(c)(ii), prompt certification of the reports is described in Rule 213(3)(c)(iii) as either of the following: **(R 336.1213(3)(c))**
 - a. Submitting a certification by a Responsible Official with each report which states that, based on information and belief formed after reasonable inquiry, the statements and information in the report are true, accurate, and complete.
 - b. Submitting, within 30 days following the end of a calendar month during which one or more prompt reports of deviations from the emissions allowed under the ROP were submitted to the department pursuant to Rule 213(3)(c)(ii), a certification by a Responsible Official which states that, "based on information and belief formed after reasonable inquiry, the statements and information contained in each of the reports submitted during the previous month were true, accurate, and complete". The certification shall include a listing of the reports that are being certified. Any report submitted pursuant to Rule 213(3)(c)(ii) that will be certified on a monthly basis pursuant to this paragraph shall include a statement that certification of the report will be provided within 30 days following the end of the calendar month.
23. Semiannually for the term of the ROP as detailed in the special conditions, or more frequently if specified, the permittee shall submit certified reports of any required monitoring to the appropriate AQD District Office. All instances of deviations from ROP requirements during the reporting period shall be clearly identified in the reports. **(R 336.1213(3)(c)(i))**
24. On an annual basis, the permittee shall report the actual emissions, or the information necessary to determine the actual emissions, of each regulated air pollutant as defined in Rule 212(6) for each emission unit utilizing the emissions inventory forms provided by the department. **(R 336.1212(6))**
25. 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 2 hours in excess of an applicable standard or limitation, as required in Rule 912, to the appropriate AQD District Office. The notice shall be provided not later than 2 business days after the start-up, shutdown, or discovery of the abnormal conditions or malfunction. Notice shall be by any reasonable means, including electronic, telephonic, or oral communication. Written reports, if required under Rule 912, must be submitted to the appropriate AQD District Supervisor 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 conditions or malfunction, whichever is first. The written reports shall include all of the information required in Rule 912(5) and shall be certified by a Responsible Official in a manner consistent with the CAA. **(R 336.1912)**

Permit Shield

26. Compliance with the conditions of the ROP shall be considered compliance with any applicable requirements as of the date of ROP issuance, if either of the following provisions is satisfied. **(R 336.1213(6)(a)(i), R 336.1213(6)(a)(ii))**
 - a. The applicable requirements are included and are specifically identified in the ROP.
 - b. The permit includes a determination or concise summary of the determination by the department that other specifically identified requirements are not applicable to the stationary source.Any requirements identified in Part E of this ROP have been identified as non-applicable to this ROP and are included in the permit shield.
27. Nothing in this ROP shall alter or affect any of the following:
 - a. The provisions of Section 303 of the CAA, emergency orders, including the authority of the USEPA under Section 303 of the CAA. **(R 336.1213(6)(b)(i))**
 - b. The liability of the owner or operator of this source for any violation of applicable requirements prior to or at the time of this ROP issuance. **(R 336.1213(6)(b)(ii))**
 - c. The applicable requirements of the acid rain program, consistent with Section 408(a) of the CAA. **(R 336.1213(6)(b)(iii))**
 - d. The ability of the USEPA to obtain information from a source pursuant to Section 114 of the CAA. **(R 336.1213(6)(b)(iv))**

28. The permit shield shall not apply to provisions incorporated into this ROP through procedures for any of the following:
- Operational flexibility changes made pursuant to Rule 215. **(R 336.1215(5))**
 - Administrative Amendments made pursuant to Rule 216(1)(a)(i)-(iv). **(R 336.1216(1)(b)(iii))**
 - Administrative Amendments made pursuant to Rule 216(1)(a)(v) until the amendment has been approved by the department. **(R 336.1216(1)(c)(iii))**
 - Minor Permit Modifications made pursuant to Rule 216(2). **(R 336.1216(2)(f))**
 - State-Only Modifications made pursuant to Rule 216(4) until the changes have been approved by the department. **(R 336.1216(4)(e))**
29. Expiration of this ROP results in the loss of the permit shield. If a timely and administratively complete application for renewal is submitted not more than 18 months, but not less than 6 months, before the expiration date of the ROP, but the department fails to take final action before the end of the ROP term, the existing ROP does not expire until the renewal is issued or denied, and the permit shield shall extend beyond the original ROP term until the department takes final action. **(R 336.1217(1)(c), R 336.1217(1)(a))**

Revisions

30. For changes to any process or process equipment covered by this ROP that do not require a revision of the ROP pursuant to Rule 216, the permittee must comply with Rule 215. **(R 336.1215, R 336.1216)**
31. A change in ownership or operational control of a stationary source covered by this ROP shall be made pursuant to Rule 216(1). **(R 336.1219(2))**
32. For revisions to this ROP, an administratively complete application shall be considered timely if it is received by the department in accordance with the time frames specified in Rule 216. **(R 336.1210(10))**
33. Pursuant to Rule 216(1)(b)(iii), Rule 216(2)(d) and Rule 216(4)(d), after a change has been made, and until the department takes final action, the permittee shall comply with both the applicable requirements governing the change and the ROP terms and conditions proposed in the application for the modification. During this time period, the permittee may choose to not comply with the existing ROP terms and conditions that the application seeks to change. However, if the permittee fails to comply with the ROP terms and conditions proposed in the application during this time period, the terms and conditions in the ROP are enforceable. **(R 336.1216(1)(c)(iii), R 336.1216(2)(d), R 336.1216(4)(d))**

Reopenings

34. A ROP shall be reopened by the department prior to the expiration date and revised by the department under any of the following circumstances:
- If additional requirements become applicable to this stationary source with three or more years remaining in the term of the ROP, but not if the effective date of the new applicable requirement is later than the ROP expiration date. **(R 336.1217(2)(a)(i))**
 - If additional requirements pursuant to Title IV of the CAA become applicable to this stationary source. **(R 336.1217(2)(a)(ii))**
 - If the department determines that the ROP contains a material mistake, information required by any applicable requirement was omitted, or inaccurate statements were made in establishing emission limits or the terms or conditions of the ROP. **(R 336.1217(2)(a)(iii))**
 - If the department determines that the ROP must be revised to ensure compliance with the applicable requirements. **(R 336.1217(2)(a)(iv))**

Renewals

35. For renewal of this ROP, an administratively complete application shall be considered timely if it is received by the department not more than 18 months, but not less than 6 months, before the expiration date of the ROP. **(R 336.1210(8))**

Stratospheric Ozone Protection

36. If the permittee is subject to Title 40 of the Code of Federal Regulations (CFR), Part 82 and services, maintains, or repairs appliances except for motor vehicle air conditioners (MVAC), or disposes of appliances containing refrigerant, including MVAC and small appliances, or if the permittee is a refrigerant reclaiming, appliance owner or a manufacturer of appliances or recycling and recovery equipment, the permittee shall comply with all applicable standards for recycling and emissions reduction pursuant to 40 CFR, Part 82, Subpart F.
37. If the permittee is subject to 40 CFR, Part 82, and performs a service on motor (fleet) vehicles when this service involves refrigerant in the MVAC, the permittee is subject to all the applicable requirements as specified in 40 CFR, Part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners. The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed by the original equipment manufacturer. The term MVAC as used in Subpart B does not include the air-tight sealed refrigeration system used for refrigerated cargo or an air conditioning system on passenger buses using Hydrochlorofluorocarbon-22 refrigerant.

Risk Management Plan

38. If subject to Section 112(r) of the CAA and 40 CFR, Part 68, the permittee shall register and submit to the USEPA the required data related to the risk management plan for reducing the probability of accidental releases of any regulated substances listed pursuant to Section 112(r)(3) of the CAA as amended in 40 CFR, Part 68.130. The list of substances, threshold quantities, and accident prevention regulations promulgated under 40 CFR, Part 68, do not limit in any way the general duty provisions under Section 112(r)(1).
39. If subject to Section 112(r) of the CAA and 40 CFR, Part 68, the permittee shall comply with the requirements of 40 CFR, Part 68, no later than the latest of the following dates as provided in 40 CFR, Part 68.10(a):
- June 21, 1999,
 - Three years after the date on which a regulated substance is first listed under 40 CFR, Part 68.130, or
 - The date on which a regulated substance is first present above a threshold quantity in a process.
40. If subject to Section 112(r) of the CAA and 40 CFR, Part 68, the permittee shall submit any additional relevant information requested by any regulatory agency necessary to ensure compliance with the requirements of 40 CFR, Part 68.
41. If subject to Section 112(r) of the CAA and 40 CFR, Part 68, the permittee shall annually certify compliance with all applicable requirements of Section 112(r) as detailed in Rule 213(4)(c)). **(40 CFR, Part 68)**

Emission Trading

42. Emission averaging and emission reduction credit trading are allowed pursuant to any applicable interstate or regional emission trading program that has been approved by the Administrator of the USEPA as a part of Michigan's State Implementation Plan. Such activities must comply with Rule 215 and Rule 216. **(R 336.1213(12))**

Permit To Install (PTI)

43. The process or process equipment included in this permit shall not be reconstructed, relocated, or modified unless a PTI authorizing such action is issued by the department, except to the extent such action is exempt from the PTI requirements by any applicable rule. ² **(R 336.1201(1))**
44. The department may, after notice and opportunity for a hearing, revoke PTI terms or conditions if evidence indicates the process or process equipment is not performing in accordance with the terms and conditions of the PTI or is violating the department's rules or the CAA. ² **(R 336.1201(8), Section 5510 of Act 451)**
45. The terms and conditions of a PTI 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 the PTI. If a new owner or operator submits a written request to the department pursuant to Rule 219 and the department approves the request, this PTI 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. The written request shall be sent to the appropriate AQD District Supervisor, MDEQ. ² **(R 336.1219)**
46. If the installation, reconstruction, relocation, or modification of the equipment for which PTI terms and conditions have been approved has not commenced within 18 months, or has been interrupted for 18 months, the applicable terms and conditions from that PTI shall become void unless otherwise authorized by the department. Furthermore, the person to whom that PTI was issued, or the designated authorized agent, shall notify the department via the Supervisor, Permit Section, MDEQ, AQD, P. O. Box 30260, Lansing, Michigan 48909, if it is decided not to pursue the installation, reconstruction, relocation, or modification of the equipment allowed by the terms and conditions from that PTI. ² **(R 336.1201(4))**

Footnotes:

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

²This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

B. SOURCE-WIDE CONDITIONS

Part B outlines the Source-Wide Terms and Conditions that apply to this stationary source. The permittee is subject to these special conditions for the stationary source in addition to the general conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply to this source, NA (not applicable) has been used in the table. If there are no Source-Wide Conditions, this section will be left blank.

C. EMISSION UNIT CONDITIONS

Part C outlines terms and conditions that are specific to individual emission units listed in the Emission Unit Summary Table. The permittee is subject to the special conditions for each emission unit in addition to the General Conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply, NA (not applicable) has been used in the table. If there are no conditions specific to individual emission units, this section will be left blank.

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
EU-KGPN	Natural gas liquid extraction and fractionation plant. Emissions due to upsets and/or emergencies are controlled by the Kalkaska Gas Plant North (KGPN) flare.	1-1-1972 / 3-28-2007	NA
EU-KGPN-TURB-C	A 60.2 MMBtu per hour natural gas fired turbine and 28.0 MMBtu per hour natural gas-fired duct burner in the waste heat recovery unit. The turbine is used for plant electrical production and the WHRU is used to heat thermal oil for other processes.	12-13-2005	NA
EU-KGPS	An idled refrigerated lean oil absorption natural gas liquid recovery process consisting of a lean oil absorber, a rich oil demethanizer, and a rich oil still to separate the natural gas liquids from the lean oil. This is a closed system. Additional components of the emission unit, including the pressurized natural gas storage tanks, heat medium heater, fuel gas system, and flare system, are operated in support of the operation of EU-KGPN.	3-1-1973	NA
EU-KGPS-TURB-A	19,750 hp natural gas-fired G.E. Frame 5 turbine with a 7.5 MW electrical generator and a 55 MMBTU per hour natural gas-fired duct burner in the waste heat recovery unit. The turbine is used for plant electrical production and the WHRU is used to heat thermal oil for other processes.	3-1-1973 / 3-1-1979	FG-KGPS-TURB
EU-KGPS-TURB-B	19,750 hp natural gas-fired G.E. Frame 5 turbine with a 7.5 MW electrical generator and a 55 MMBTU per hour natural gas-fired duct burner in the waste heat recovery unit. The turbine is used for plant electrical production and the WHRU is used to heat thermal oil for other processes.	3-1-1973 / 3-1-1979	FG-KGPS-TURB
EU-KGPN-GENERATOR	275 horsepower International Harvester gas-fired emergency generator.	10-1-1972	FG-EMERGENS

Emission Unit ID	Emission Unit Description (Including Process Equipment & Control Device(s))	Installation Date/ Modification Date	Flexible Group ID
EU-KGPS-GENERATOR	1,090 horsepower Waukesha gas-fired emergency generator.	5-1-1973	FG-EMERGENS
EU-KGPN-FIREWATER	125 horsepower Cummins gas-fired emergency fire water engine.	10-1-1972	FG-EMERGENS
EU-KGPS-FIREWATER	145 horsepower Minneapolis Moline gas-fired emergency fire water engine.	5-1-1973	FG-EMERGENS
EU-RULE290	Any existing or future emission unit exempt from R 336.1201 pursuant to R 336.1278 and R 336.1290	NA	FG-RULE290

**EU-KGPN
 EMISSION UNIT CONDITIONS**

DESCRIPTION

Natural Gas Liquid Extraction and Fractionation Plant.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

Closed vent system and flare

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

1. The permittee shall operate a continuously burning pilot flame at the flare. The presence of a flare pilot flame shall be monitored using a thermocouple or any other equivalent device to detect the presence of a flame. **(40 CFR 60.18(c)(2), 40 CFR 60.18(f)(2), 40 CFR 60.633(g))**
2. The permittee shall not operate the natural gas processing plant unless the flare which controls its emissions is installed and operating properly. **(40 CFR 60.18(e), 40 CFR 60.633(g))**
3. The flare shall be operated with no visible emissions, except for periods not to exceed a total of 5 minutes during any 2 consecutive hours. **(40 CFR 60.18(c)(1), 40 CFR 60.633(g))**
4. The closed vent system and flare shall be operated at all times when emissions may be vented to them. **(40 CFR 60.482-10(m), 40 CFR 60.632(a))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

5. The closed vent system and flare shall be operated at all times when emissions may be vented to them. **(40 CFR 60.482-10a(m), 40 CFR 60.5400(a))**

Leak Detection and Repair for Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

6. When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Conditions III.38-43. A first attempt at repair shall be made no later than 5 calendar days after each leak is detected. **(40 CFR 60.482-2(c), 40 CFR 60.482-2(d)(6), 40 CFR 60.482-3(g), 40 CFR 60.482-7(d), 40 CFR 482-8(c), 40 CFR 60.483-1(b)(3), 40 CFR 60.632(a))**

Leak Detection and Repair for Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

7. When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 days after it is detected, except as provided in Conditions III.44-49 (Delay of Repair). A first attempt at repair shall be made no later than 5 calendar days after each leak is detected. **(40 CFR 60.482-2a(c), 40 CFR 60.482-3a(g), 40 CFR 60.482-8a(c), 40 CFR 60.482-11a(d), 40 CFR 60.483-1a(b)(3), 40 CFR 60.482-7a(d), 40 CFR 60.5400(a) and (b))**
8. If evidence of a potential leak is found by visual, audible, olfactory, or any other detection method, from a pressure relief device in light liquid service, the permittee shall monitor the equipment within 5 days or eliminate the visual, audible, olfactory, or other indication of a potential leak within 5 calendar days of detection. **(40 CFR 60.482-8a(a), 40 CFR 60.5400(a))**
9. If any inaccessible connector in gas/vapor service or light liquid service is observed by visual, audible, olfactory, or other means, to be leaking, the visual, audible, olfactory, or other indications of a leak to the atmosphere shall be eliminated as soon as practicable. **(40 CFR 60.482-11a(f)(2), 40 CFR 60.5400(a))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

10. Each open-ended valve or line equipped with a second valve shall be operated in such a manner that the valve on the process fluid end is closed before the second valve is closed. **(40 CFR 60.482-6(b), 40 CFR 60.632(a))**
11. When a double block-and-bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with Condition IV.2 at all other times. **(40 CFR 60.482-6(c), 40 CFR 60.632(a))**
12. Any valve in gas/vapor or light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 parts per million (ppm) above background, is exempt from the requirements of Conditions V.8 and V.9 provided that the valve has no external actuating mechanism in contact with the process fluid, and is operated with emissions less than 500 ppm above background. **(40 CFR 60.482-7(f)(1) and (2), 40 CFR 60.632(a))**
13. The permittee may elect to comply with an allowable percentage of valves leaking of equal to or less than 2.0 percent. **(40 CFR 60.483-1(a), 40 CFR 60.483-1(d), 40 CFR 60.632(b))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

14. Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed. **(40 CFR 60.482-6a(b), 40 CFR 60.5400(a))**
15. When a double block-and-bleed system is used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with Condition IV.3 at all other times. **(40 CFR 60.482-6a(c), 40 CFR 60.5400(a))**
16. Any valve in gas/vapor or light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Conditions V.15 and V.16 provided that the valve has no external actuating mechanism in contact with the process fluid and is operated with emissions less than 500 ppm above background. **(40 CFR 60.5400(a), 40 CFR 60.482-7a(f)(1), 40 CFR 60.482-7a(f)(2))**
17. The permittee may elect to comply with an allowable percentage of valves leaking of equal to or less than 2.0 percent. **(40 CFR 60.483-1a(a), 40 CFR 60.483-1a(d), 40 CFR 60.5400(b))**

Compressors for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

18. Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of Volatile Organic Chemicals (VOC) to the atmosphere, except as provided in Conditions III.20 and V.2. The barrier fluid system for each compressor shall be in heavy liquid service or shall not be in VOC service. Each compressor seal system shall be: **(40 CFR 60.482-3(a), 40 CFR 60.482-3(b), and 40 CFR 60.482-3(c), 40 CFR 60.632(a))**
 - a. Operated with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or
 - b. Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10; or
 - c. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
19. Each compressor barrier fluid system as described in Condition III.18 shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both. Each sensor shall be checked daily or shall be equipped with an audible alarm. Based on design considerations and operating experience, the permittee shall determine a criterion that indicates failure of the seal system, barrier fluid system, or both. If the sensor indicates failure of the seal system, barrier fluid system, or both, based on the established criterion, a leak is detected. **(40 CFR 60.482-3(d), 40 CFR 60.482-3 (e), 40 CFR 60.482-3 (f), 40 CFR 60.632(a))**
20. Any compressor that is designated and demonstrated to be operating with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background is exempt from the requirements of Conditions III.18 and III.19. **(40 CFR 60.482-3(i), 40 CFR 60.632(a))**
21. Reciprocating compressors in wet gas service are exempt from the compressor control requirements of Conditions III.18-19 and 40 CFR 60.482-3. **(40 CFR 60.633(f))**

Compressors for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

22. Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of VOC to the atmosphere, except as provided in Conditions III.24 and V.3. The barrier fluid system shall be in heavy liquid service or shall not be in VOC service. Each compressor seal system shall be: **(40 CFR 60.482-3a(a), 40 CFR 60.482-3a (b), 40 CFR 60.482-3a (c), 40 CFR 60.5400(a))**
 - a. Operated with a barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or

- b. Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10a; or
 - c. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
23. Each compressor barrier fluid system as described in Condition III.22 shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both. Each sensor shall be checked daily or shall be equipped with an audible alarm. Based on design considerations and operating experience, the permittee shall determine a criterion that indicates failure of the seal system, barrier fluid system, or both. If the sensor indicates failure of the seal system, barrier fluid system, or both, based on the established criterion, a leak is detected. **(40 CFR 60.482-3a(d), 40 CFR 60.482-3a (e), 40 CFR 60.482-3a (f), 40 CFR 60.5400(a))**
24. Any compressor that is designated and demonstrated to be operating with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background is exempt from the requirements of Conditions III.22 and III.23. **(40 CFR 60.482-3a(i)(1), 40 CFR 60.5400(a))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

25. Except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.482-4(a), 40 CFR 60.632(a))**
26. After each pressure release, the pressure relief device shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background as soon as practicable, but no later than 5 calendar days after the pressure release, except as provided in Conditions III.38 and III.39. **(40 CFR 60.482-4a(b)(1), 40 CFR 60.632(a))**
27. Any pressure relief device that is routed to a process or fuel gas system or equipped with a closed vent system capable of capturing and transporting leakage through the pressure relief device to a control device is exempted from the requirements of Conditions III.25, III.26, and V.22. **(40 CFR 60.482-4(c), 40 CFR 60.632(a))**
28. Any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of Conditions III.38, III.39, and V.22 provided that a new rupture disk is installed after each pressure release as soon as practicable but no later than 5 calendar days after each pressure release, except as provided in Conditions III.38 and 39. **(40 CFR 60.482-4(d), 40 CFR 60.632(a))**
29. If evidence of a potential leak is found by visual, audible, olfactory, or any other detection method, from a pressure relief device in light liquid service and connectors, the permittee shall eliminate the potential leak within 5 calendar days of detection or the permittee shall monitor the equipment within 5 days. If a leak is detected, it shall be repaired as soon as practicable but not later than 15 calendar days after it is detected, except as provided in Conditions III.38 and 39. A first attempt at repair shall be made no later than 5 calendar days after each leak is detected. **(40 CFR 60.482-8(a), 40 CFR 60.632(a))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

30. Except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.482-4a(a), 40 CFR 60.5400(a))**

31. After each pressure release, the pressure relief shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background as soon as practicable but no later than 5 calendar days after the pressure release, except as provided in Conditions III.44 and 45. **(40 CFR 60.482-4a(b)(1), 40 CFR 60.5400(a))**
32. Any pressure relief device that is routed to a process or fuel gas system or equipped with a closed vent system capable of capturing and transporting leakage through the pressure relief device to a control device is exempted from the requirements of Conditions III.30, III.31 and V.23. **(40 CFR 60.482-4a(c), 40 CFR 60.5400(a))**
33. Any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of Conditions III.30, III.31, and V.23 provided that a new rupture disk is installed upstream of the pressure relief device as soon as practicable but no later than 5 calendar days after each pressure release, except as provided in in Conditions III.44 and 45. **(40 CFR 60.482-4a(d), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

34. Any pump in light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Conditions V.4, V.5, and IV.4 provided that the pump has no externally actuated shaft penetrating the pump housing and is demonstrated to be operating with no detectable emissions. **(40 CFR 60.482-2(e)(1) and (2), 40 CFR 60.632(a))**
35. Any pump in light liquid service that is equipped with a closed vent system capable of capturing and transporting any leakage from the seal or seals to a process or to a fuel gas system or a control device is exempt from the requirements of Conditions V.4, V.5, and IV.4. **(40 CFR 60.482-2(f), 40 CFR 60.632(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

36. Any pump in light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Conditions V.6, V.7, and IV.5 provided that the pump has no externally actuated shaft penetrating the pump housing and is demonstrated to be operating with no detectable emissions. **(40 CFR 60.482-2a(e), 40 CFR 60.5400(a))**
37. Any pump in light liquid service that is equipped with a closed vent system capable of capturing and transporting any leakage from the seal or seals to a process or to a fuel gas system or a control device is exempt from the requirements of Conditions V.6, V.7, and IV.5. **(40 CFR 60.482-2a(f), 40 CFR 60.5400(a))**

Delay of Repair for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

38. The delay of repair for which leaks have been detected will be allowed if repair within 15 days is technically infeasible without a process unit shutdown. Repair of this equipment shall occur before the end of the next process unit shutdown. Monitoring to verify repair must occur within 15 days after startup of the process unit. **(40 CFR 60.482-9(a), 40 CFR 60.632(a))**
39. The delay of repair for equipment will be allowed for equipment which is isolated from the process and which does not remain in VOC service. **(40 CFR 60.482-9(b), 40 CFR 60.632(a))**

40. Delay of repair for valves will be allowed if: **(40 CFR 60.482-9(c), 40 CFR 60.632(a))**
 - a. The permittee demonstrates that the emissions of purged material resulting from immediate repair are greater than fugitive emissions likely to result from delay of repair and when repair, and
 - b. When repair procedures are affected, the purged material is collected and destroyed or recovered in a control device complying with 40 CFR 60.482-10.
41. Delay of repair beyond a process unit shutdown will be allowed for a valve, if valve assembly replacement is necessary during the process unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the next process unit shutdown will not be allowed unless the next process unit shutdown occurs sooner than 6 months after the first process unit shutdown. **(40 CFR 60.482-9(e), 40 CFR 60.632(a))**
42. When a delay of repair is allowed for a leaking pump or valve that remains in service, the pump or valve may be considered repaired and no longer subject to delay of repair requirements if 2 consecutively monthly monitoring instrument readings are below the leak definition. **(40 CFR 60.482-9(f), 40 CFR 60.632(a))**
43. Delay of repair for pumps will be allowed if the repair requires the use of a dual mechanical seal system that includes a barrier fluid system, and the repair is completed as soon as practicable, but not later than 6 months after the leak was detected. **(40 CFR 60.482-9(d), 40 CFR 60.632(a))**

Delay of Repair for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

44. The delay of repair for which leaks have been detected will be allowed if repair within 15 days is technically infeasible without a process unit shutdown. Repair of the equipment shall occur before the end of the next process unit shutdown. Monitoring to verify repair must occur within 15 days after startup of the process unit. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(a))**
45. The delay of repair of equipment will be allowed for equipment which is isolated from the process and which does not remain in VOC service. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(b))**
46. Delay of repair for valves and connectors will be allowed if: **(40 CFR 60.5400(a), 40 CFR 60.482-9a(c))**
 - a. The permittee demonstrates that emissions of purged material resulting from the immediate repair are greater than the fugitive emissions likely to result from the delay of repair, and
 - b. When repair procedures are effected, the purged material is collected and destroyed or recovery in a control device complying with 40 CFR 60.482-10a.
47. Delay of repair beyond a process unit shutdown will be allowed for a valve, if the valve assembly replacement is necessary during the process unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the next process unit shutdown will not be allowed unless the next process unit shutdown occurs sooner than 6 months after the first process unit shutdown. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(e))**
48. Delay of repair for pumps will be allowed if repair requires the use of a dual mechanical seal system that includes a barrier fluid system and repair is completed as soon as practicable, but not later than 6 months after the leak was detected. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(d))**
49. When delay of repair is allowed for a leaking pump, valve, or connector that remains in service, the pump, valve, or connector may be considered to be repaired and no longer subject to delay of repair requirements if 2 consecutive monthly monitoring instrument readings are below the leak definition. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(f))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall comply with the heat content specifications in 40 CFR 60.18(c)(3)(ii) and the maximum tip velocity specifications in 40 CFR 60.18(c)(4), or comply with the requirements of 40 CFR 60.18(c)(3)(i). **(40 CFR 60.18(c)(3) and (4), 40 CFR 60.633(g))**

Open-Ended Valves or Lines for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

2. Except as provided in 40 CFR 60.482-6(d) and (e), each open-ended valve or line shall be equipped with a cap, blind flange, plug, or second valve. The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring process fluid flow through the open-ended valve or line. **(40 CFR 60.482-6(a), 40 CFR 60.632(a))**

Open-Ended Valves or Lines for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

3. Except as provided in 40 CFR 60.482-6a(d), each open-ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve. The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations required process fluid flow through the open ended valve or line. **(40 CFR 60.482-6a(a), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

4. Each pump in light liquid service equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of Conditions V.4 and V.5, provided that the pump meets the following: **(40 CFR 60.482-2(d)(1), (2), (3), and (5), 40 CFR 60.632(a))**
 - a. Each dual mechanical seal system is:
 - i. Operated with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure; or
 - ii. Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10; or
 - iii. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
 - b. The barrier fluid system is in heavy liquid service or is not in VOC service.
 - c. Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.
 - i. Each sensor shall be checked daily or equipped with an audible alarm.
 - ii. The permittee determines, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.
 - iii. If the sensor indicates failure of the seal system, the barrier fluid system, or both, based on the criterion established, a leak is detected and shall be repaired as specified in Condition III.6.

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

5. Each pump in light liquid service equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of Conditions V.6 and V.7, provided that the pump meets the following: **(40 CFR 60.482-2a(d)(1), (2), (3), (4), and (5), 40 CFR 60.5400(a))**
 - a. Each dual mechanical seal system is:
 - i. Operated with no barrier fluid at a pressure that is all times greater than the pump stuffing box pressure; or
 - ii. Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10; or
 - iii. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
 - b. The barrier fluid system is in heavy liquid service or is not in VOC service.
 - c. Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.
 - i. Each sensor shall be checked daily or equipped with an audible alarm.
 - ii. The permittee determines, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.
 - iii. If the sensor indicates failure of the seal system, the barrier fluid system, or both, based on criterion established, a leak is detected and shall be repaired as specified in Condition III.7.
 - d. Each pump is checked by visual inspection, each calendar week, for indications of liquids dripping from the pump seals. If there are indications of liquids dripping from the pump seal at the time of the weekly inspection, the permittee shall perform the following procedures prior to the next required inspection.
 - i. Monitor the pump within 5 business days to determine if there is a leak of VOC in the barrier fluid; or
 - ii. Designate the visual indications of liquids dripping as a leak.

V. TESTING/SAMPLING

Records shall be maintained on file for a period of 5 years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall perform non-certified visible emissions observations using USEPA Method 22 to determine the presence of visible emissions from the flare. The visible emissions observations shall be performed on a quarterly basis and the observation period shall be 2 hours. **(40 CFR 60.18(f)(1), 40 CFR 60.633(g), R 336.1213(3))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

2. Each compressor, each pump in light liquid service, and each valve in gas/vapor and in light liquid service designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background shall be tested for compliance annually and at other times requested by the AQD. **(40 CFR 60.482-2(e)(3), 40 CFR 60.482-7(f)(3), 40 CFR 60.482-3(i)(2), 40 CFR 60.632(a))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

3. Each pump in light liquid service, compressor, and each valve in gas/vapor service and in light liquid service designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background shall be tested for compliance initially upon designation, annually, and at other times requested by the AQD. **(40 CFR 60.482-2a(e), 40 CFR 60.482-3a(i)(2), 40 CFR 60.482-7a(f)(3), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

4. Except as provided in Conditions III.34, III.35, and IV.4, each pump in light liquid service shall be monitored monthly to detect leaks. A pump that begins operation in light liquid service after the initial startup date of the process unit must be monitored for the first time within thirty days after the end of its startup period except for a pump that replaces a leaking pump and except as provided in Conditions III.34, III.35 and IV.4. A leak is detected when an instrument reading of 10,000 ppm or greater is measured. **(40 CFR 60.482-2(a)(1), 40 CFR 60.482-2(b)(1), 40 CFR 60.632(a))**
5. Each pump in light liquid service shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. If liquids are dripping from the pump seal, the permittee shall either designate the visual indications as a leak and repair the leak within 15 days of detection by eliminating the visual indications of liquids dripping or monitor the pump within 5 days and repair the leak using the procedures specified in Condition III.6. **(40 CFR 60.482-2(a)(2), 40 CFR 60.482-2(b)(2), 40 CFR 60.482-2(d)(4), 40 CFR 60.632(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

6. Except as provided in Conditions III.36, III.37, and IV.5, each pump in light liquid service shall be monitored monthly to detect leaks. A pump that begins operation in light liquid service after the initial startup date of the process unit must be monitored for the first time within thirty days after the end of its startup period except for a pump that replaces a leaking pump and except as provided in Condition III.36, III.37, and IV.5. A leak is detected when an instrument reading of 2,000 ppm or greater is measured. **(40 CFR 60.482-2a(b)(1)(ii), 40 CFR 60.5400(a))**
7. Each pump in light liquid service shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. If liquids are dripping from the pump seal, the permittee shall either designate the visual indications as a leak and repair the leak within 15 days of detection by eliminating the visual indications of liquids dripping or monitor the pump within 5 days and repair the leak using the procedures in Condition III.6. **(40 CFR 60.482-2a(a)(2), 40 CFR 60.482-2a(b)(2), 40 CFR 60.482-2a(d)(4), 40 CFR 60.5400(a))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

8. Except as provided in Conditions III.12, V.10, V.11, V.12, IX.6, or IX.7, each valve in gas/vapor service and light liquid service shall be monitored monthly to detect leaks. A leak is detected when an instrument reading of 10,000 ppm or greater is measured. If a leak is not detected for 2 successive months, the valve may be monitored the first month of every quarter, beginning with the next quarter, until a leak is detected. As an alternative to monitoring all of the valves in the first month of the quarter, the permittee may elect to subdivide the process unit into two or three subgroups and monitor each subgroup in a different month during the quarter, provided each subgroup is monitored every three months. When a leak is detected, the valve shall be monitored monthly until a leak is not detected for 2 successive months. The permittee may elect to comply with the alternative work practices specified in Conditions V.10 and V.11. **(40 CFR 60.482-7(a)(1), (b), (c)(1)(i) and (ii), (c)(2), 40 CFR 60.483-2(a)(1), 40 CFR 60.632(a))**

9. Except for a valve that replaces a leaking valve and except as provided in Conditions III.12, V.10, V.11, V.12, IX.6, and IX.7, a valve that begins operation in gas/vapor service or light liquid service after the initial startup date for the process unit must be: **(40 CFR 60.482-7(a)(2), 40 CFR 60.632(a))**
 - a. Monitored as in Condition V.8. The valve must be monitored for the first time within 30 days after the end of its startup period to ensure proper installation; or
 - b. If the valves in the process unit are monitored in accordance with Condition III.13, V.10, or V.11, count the new valve as leaking when calculating the percentage of valves leaking as described in 483-2(b)(5). If less than 2.0 percent of the valves are leaking for that process unit, the valve must be monitored for the first time during the next scheduled monitoring event for existing valves in the process unit or within 90 days, whichever comes first.
10. After initially complying with Condition V.8 for 2 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0, the permittee may begin to skip 1 of the quarterly leak detection periods for the valves in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.8 but may elect to use this section again. **(40 CFR 60.483-2(a), 40 CFR 60.483-2 (b)(1), 40 CFR 60.483-2(2), 40 CFR 60.483-2(4))**
11. After initially complying with Conditions V.8 and V.10 for 5 consecutive quarterly leak detection periods with the percent valves leaking equal to or less than 2.0, an owner or operator may begin to skip 3 of the quarterly leak detection periods for the valves in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.8 but may elect to use this section again. **(40 CFR 60.483-2(a), 40 CFR 60.483-2(b)(1), 40 CFR 60.483-2(3), 40 CFR 60.483-2(4))**
12. If electing to comply with Condition III.13 for valves, the permittee shall monitor for leaks on an annual basis. **(40 CFR 60.483-1(b)(2))**
13. Any valve in gas/vapor service or light liquid service that is designated as unsafe-to-monitor shall be monitored as frequently as practicable during safe-to-monitor times. **(40 CFR 60.482-7(g)(2), 40 CFR 60.632(a))**
14. Any valve in gas/vapor service or light liquid service that is designated as difficult-to-monitor shall be monitored at least once per calendar year. **(40 CFR 60.482-7(h)(3), 40 CFR 60.632(a), R 336.1213(3))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

15. Except as provided in Conditions III.16, V.18, V.19, V.20, IX.9, or IX.12, each valve in gas/vapor service shall be monitored monthly to detect leaks. A leak is detected when an instrument reading of 500 ppm or greater is measured. If a leak is not detected for 2 successive months, the valve may be monitored the first month of every quarter, beginning the next quarter, until a leak is detected. As an alternative to monitoring all of the valves in the first month of the quarter, the permittee may elect to subdivide the process unit into two or three subgroups and monitor each subgroup in a different month during the quarter, provided each subgroup is monitored every three months. When a leak is detected, the valve shall be monitored monthly until a leak is not detected for 2 successive months. The permittee may elect to comply with the alternative work practices specified in Conditions V.19 and V.20. **(40 CFR 60.482-7a(1), 40 CFR 60.482-7a(b), 40 CFR 60.482-7a(c)(1)(i) and (ii), 40 CFR 60.482-7a(c)(2), 40 CFR 60.482-3a(a)(1), 40 CFR 60.5400(a))**
16. Except for a valve that replaces a leaking valve and except as provided in Conditions III.16, V.18, V.19, V.20, IX.9, or IX.12, a valve that begins operation in gas/vapor service or light liquid service after the initial startup date for the process unit must be: **(40 CFR 60.482-7a(a)(2), 40 CFR 60.5400(a))**
 - a. Monitored as in Condition V.15. The valve must be monitored for the first time within 30 days after the end of its startup period to ensure proper installation; or
 - b. If the existing valves in the process unit are monitored in accordance with Conditions III.17, V.18, or V.19, count the new valve as leaking when calculating the percentage of valves leaking as described in 40 CFR 60.483-2a(b)(5). If less than 2.0 percent of the valves are leaking for that process unit, the valve must be monitored for the first time during the next scheduled monitoring event for existing valves in the process unit or within 90 days, whichever comes first.

17. Any valve in gas/vapor or light liquid service that is designated as unsafe-to-monitor shall be monitored as frequently as practicable during safe-to-monitor times and any valve that is designated as difficult-to-monitor shall be monitored at least once per calendar year. **(40 CFR 60.482-7a(g)(2), 40 CFR 60.482-7a(h)(3), 40 CFR 60.5400(a))**
18. If electing to comply with Condition III.17 for valves, the permittee shall monitor for leaks initially upon designation, annually, and at other times requested by the AQD. **(40 CFR 60.483-1a(b)(2), 40 CFR 60.5400(b))**
19. After initially complying with Condition V.15 for 2 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0, the permittee may begin to skip one of the quarterly leak detection periods for the valves in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.15 but may elect to use this section again. **(40 CFR 60.483-2a(a), (b)(1), (2), and (4), 40 CFR 60.5400(b))**
20. After initially complying with Conditions V.15 and V.19 for 5 consecutive quarterly leak detection periods with the percent valves equal to or less than 2.0, the permittee may begin to skip three of the quarterly leak detection periods for the valves in in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.15 but may elect to use this section again. **(40 CFR 60.483-2a(a), (b)(1), (3), and (4), 40 CFR 60.5400(b))**
21. A valve that begins operation in gas/vapor service or light liquid service after the initial startup date for a process unit following one of the alternative standards in this section must be monitored in accordance with Conditions V.15 and 16 before the provisions of Condition V.19 and 20 can be applied to that valve. **(40 CFR 60.483-2a(b)(7), 40 CFR 60.5400(b))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

22. No later than 5 calendar days after a pressure release, the pressure relief device in gas/vapor service shall be monitored to confirm the conditions of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.482-4(b)(2), 40 CFR 60.632(a))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

23. No later than 5 calendar days after a pressure release, the pressure relief device in gas/vapor service shall be monitored to confirm the conditions of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.5400(a), 40 CFR 60.482-4a(b)(2))**

Connectors in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

24. The permittee shall initially monitor all connectors in the process unit for leaks by the later of either 12 months after the compliance date or 12 months after the initial startup. A leak is detected if an instrument reading of greater than or equal to 500 ppm is measured. If all connectors in the process unit have been monitored for leaks prior to the compliance date, no initial monitoring is required provided either no process changes have been made since the monitoring or the permittee can determine that the results of the monitoring, with or without adjustments, reliably demonstrate compliance despite process changes. If required to monitor because of a process change, the permittee is required to monitor only those connectors involved in the process change. **(40 CFR 60.482-11a(a), 40 CFR 60.482-11a(b)(2), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**

25. The permittee shall perform monitoring, subsequent to the initial monitoring required in Condition V.24. The required period in which monitoring must be conducted shall be determined by the following schedule using the monitoring results from the preceding monitoring period. If a connector is found to be leaking, it shall be re-monitored once within 90 days after repair to confirm that it is not leaking: **(40 CFR 60.482-11a(b)(3), 40 CFR 60.482-11a(b)(3)(iv), 40 CFR 60.5400(a))**
- a. If the percent leaking connectors in the process unit were greater than or equal to 0.5 percent, then monitor within 12 months (1 year).
 - b. If the percent leaking connectors in the process unit was greater than or equal to 0.25 percent but less than 0.5, then monitor within 4 years. The permittee may comply with the requirements of this paragraph by monitoring at least 40 percent of the connectors within 2 years of the start of the monitoring period, provided all connectors have been monitored by the end of the 4 year monitoring period.
 - c. If the percent leaking connectors in the process unit was less than 0.25 percent, then monitor as at least 50 percent of the connectors within four years of the start of the monitoring period; and
 - i. If the percent of leaking connectors calculated from the monitoring results is greater than or equal to 0.35 percent of the monitored connectors, the permittee shall monitor as soon as practical, but within the next 6 months, all connectors that have not yet been monitored during the monitoring period. At the conclusion of monitoring, a new monitoring period shall be started based on the percent of leaking connectors within the total monitored connectors; or
 - ii. If the percent of leaking connectors calculated from the monitoring results is less than 0.35 percent of the monitored connectors, the permittee shall monitor all connectors that have not yet been monitored within eight years of the start of the monitoring period.

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of 5 years. **(R 336.1213(3)(b)(ii))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

1. The following information pertaining to all equipment subject to the requirements of 40 CFR 60.482-1 to 10 shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486(e), 40 CFR 60.632(e))**
 - a. A list of identification numbers for equipment subject to the requirements of 40 CFR, Part 60, Subparts VV and KKK.
 - b. A list of identification numbers for equipment that are designated for no detectable emissions under the provisions of Conditions III.12, III.20, and III.34.
 - c. The designation of equipment as subject to the requirements of Conditions III.12, III.20, and III.34 shall be signed by the permittee.
 - d. The dates of each compliance test as required in Condition V.2.
 - e. The background level measured during each compliance test.
 - f. The maximum instrument reading measured at the equipment during each compliance test.
 - g. A list of identification numbers for equipment in vacuum service.
2. When a leak is detected from a pump in light liquid service, a compressor, a valve in gas/vapor service or light liquid service, a pressure relief device in light liquid service, or connectors, the following information shall be recorded in a log and shall be kept in a readily accessible location: **(40 CFR 60.635(b)(2), 40 CFR 60.486(c))**
 - a. The instrument and operator identification numbers and the equipment identification number.
 - b. The date the leak was detected and the dates of each attempt to repair the leak.
 - c. Repair methods applied in each attempt to repair the leak.
 - d. "Above 10,000 ppm" if the maximum instrument reading measured after each repair attempt is equal to or greater than 10,000 ppm.
 - e. "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.
 - f. The signature of the owner or operator whose decision it was that repair could not be affected without a process unit shutdown.
 - g. The expected date of successful repair of the leak, if a leak is not repaired within 15 calendar days.
 - h. Dates of process unit shutdown that occurs while the equipment is unrepaired.
 - i. The date of successful repair of the leak.

3. The following information pertaining to all unsafe-to-monitor and difficult-to-monitor valves and all unsafe to monitor pumps shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486(f), 40 CFR 60.632(e))**
 - a. A list of identification numbers for valves and pumps that are designated as difficult-to-monitor or unsafe-to-monitor.
 - b. An explanation for each valve or pump stating why it is difficult-to-monitor or unsafe-to-monitor.
 - c. The plan for monitoring each unsafe-to-monitor valve or pump.
 - d. The schedule for monitoring each unsafe-to-monitor valve or pump.
4. The following information shall be recorded for valves complying with Conditions V.10 and V.11 (Alternative Standards for Valves – Skip Period Leak Detection and Repair): **(40 CFR 60.486(g), 40 CFR 60.483-2(b)(6), 40 CFR 60.632(e))**
 - a. A schedule for monitoring.
 - b. The percent of valves found leaking during each monitoring period.
5. The permittee shall keep the following information for closed vent systems and flares described in 40 CFR 60.482-10 in a readily accessible location: **(40 CFR 60.486(d))**
 - a. Detailed schematics, design specifications, and piping and instrumentation diagrams.
 - b. The dates and descriptions of any changes in the design specifications.
 - c. A description of the parameter(s) monitored as required by 40 CFR 60.482-10(e), to ensure the control devices are operated and maintained in conformance with the design; and an explanation of why the parameter(s) were selected for the monitoring.
 - d. Periods when the closed vent systems and control devices are not operated as designed, including periods when a flare pilot light does not have a flame.
 - e. Dates of startups and shutdowns of the closed vent systems and control devices.
6. If electing to comply with the alternative monitoring requirements listed in Condition V.8 for valves in gas/vapor service and in light liquid service, the permittee shall keep records of the valves assigned to each subgroup. **(40 CFR 60.482-7(c)(ii))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

7. The following information pertaining to all equipment subject to the requirements of 40 CFR 60.482-1a to 60.482-10a shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(e), 40 CFR 60.5400(e))**
 - a. A list of identification numbers for equipment subject to the requirements of 40 CFR, Part 60, Subparts VVa and OOOO.
 - b. A list of identification numbers for equipment that are designated for no detectable emissions under the provisions of Conditions III.16, III.24, and III.36.
 - c. The designation of equipment as subject to the requirements of Conditions III.16, III.31, and III.36 shall be signed by the permittee.
 - d. A list of equipment identification numbers for pressure relief devices required to comply with Conditions III.30, III.31, and V.23.
 - e. The dates of each compliance test as required in Condition V.3.
 - f. The background level measured during each compliance test.
 - g. The maximum instrument reading measured at the equipment during each compliance test.
 - h. A list of identification numbers for equipment in vacuum service.
 - i. The date and results of the weekly visual inspection for indications of liquids dripping from pumps in light liquid service.
 - j. Records of the information for monitoring instrument calibrations conducted:
 - i. Date of calibration and initials of the operator performing the calibration.
 - ii. Calibration gas cylinder identification, certification date, and certified concentration.
 - iii. Instrument scale(s) used.
 - iv. A description of any corrective action taken if the meter readout could not be adjusted to correspond to the calibration gas value.
 - v. Results of each calibration drift assessment.

- k. The connector monitoring schedule for each process unit as specified in Conditions V.24 and 25;
 - l. Records of the release from a pressure relief device subject to Condition III.31.
8. When a leak is detected from a pump in light liquid service, a compressor, a valve in gas/vapor service or light liquid service, a pressure relief device in light liquid service, or connectors, the following information shall be recorded in a log and shall be kept in a readily accessible location: **(40 CFR 60.486a(c), 40 CFR 60.5400(e))**
- a. The instrument and operator identification numbers and the equipment identification number.
 - b. The date the leak was detected and the dates of each attempt to repair the leak.
 - c. Repair methods applied in each attempt to repair the leak.
 - d. Maximum instrument reading measured at the time the leak is successfully repaired or determined non-repairable, except when a pump is repaired by eliminating indications of liquids dripping.
 - e. "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.
 - f. The signature of the owner or operator whose decision it was that repair could not be affected without a process unit shutdown.
 - g. The expected date of successful repair of the leak if a leak is not repaired within 15 calendar days.
 - h. Dates of process unit shutdown that occurs while the equipment is unrepaired.
 - i. The date of successful repair of the leak.
9. The following information pertaining to all valves subject to Conditions V.17 and IX.12 and all pumps and connectors subject to the requirements of Condition IX.9 shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(f) 40 CFR 60.5400(e))**
- a. A list of identification numbers for valves that are designated as unsafe to monitor, an explanation for each valve stating why the valve is unsafe-to-monitor, and the plan for monitoring each valve.
 - b. A list of identification numbers for valves, pump, and connector that are designated as difficult-to-monitor, an explanation for each valve, pump, and connector stating why the valve, pump, and connector is difficult-to-monitor, and the schedule for monitoring each valve, pump, and connector.
10. The permittee shall record a schedule of monitoring and the percent of valves found leaking during each monitoring period for valves complying with Conditions V.19 and 20. **(40 CFR 60.486a(g), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**
11. The following information shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(h), 40 CFR 60.5400(e))**
- a. Design criterion required in Conditions IV.5 and III.23 and explanation of the design criterion.
 - b. Any changes to the criterion and the reason for the changes.
12. The permittee shall keep the following information for closed vent systems and flares described in 60.482-10a in a readily accessible location: **(40 CFR 60.486a(d), 40 CFR 60.5400(e))**
- a. Detailed schematics, design specifications, and piping and instrumentation diagrams.
 - b. The dates and descriptions of any changes in the design specifications.
 - c. A description of the parameter(s) monitored as required by 40 CFR 60.482-10a(e), to ensure the control devices are operated and maintained in conformance with the design and an explanation of why the parameter(s) was/were selected for the monitoring.
 - d. Periods when the closed vent systems and control devices are not operated as designed, including periods when a flare pilot light does not have a flame.
 - e. Dates of startups and shutdowns of the closed vent systems and control devices.
13. The permittee shall record the following information for each monitoring event required by Conditions V.3, V.6, V.15, V.19, V.20, V.24, and V.25: **(40 CFR 60.486a(a)(3), 40 CFR 60.5400(e))**
- a. Monitoring instrument identification.
 - b. Operator identification.
 - c. Equipment identification.
 - d. Date of monitoring.
 - e. Instrument reading.

14. The permittee shall keep a record of the start date and end date of each monitoring period for each connector. **(40 CFR 60.482-11a(b)(3)(v), 40 CFR 60.5400(a))**
15. If electing to comply with the alternative monitoring requirements listed in Condition V.15 for valves in gas/vapor service and in light liquid service, the permittee shall keep records of the valves assigned to each subgroup. **(40 CFR 60.482-7a(c)(ii))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD's District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD's District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

4. The permittee shall submit semi-annual reports. The report shall be postmarked or received by the appropriate AQD's District Office by January 30 for the reporting period of July 1 to December 31 and July 30 for the reporting period of January 1 to June 30. The semi-annual reports shall contain the following information:² **(40 CFR 60.636(a), 40 CFR 60.636(c), 40 CFR 60.487(a), 40 CFR 60.487(c))**
 - a. The process unit identification.
 - b. For each month during the semi-annual reporting period:
 - i. The number of pressure relief devices for which leaks were detected as required in 40 CFR 60.633(b)(2).
 - ii. The number of pressure relief devices for which leaks were not repaired are required in 40 CFR 60.633(b)(2).
 - iii. The number of valves for which leaks were detected as described in Conditions V.8, V.10, and V.11.
 - iv. The number of valves for which leaks were not repaired as required in Condition III.6.
 - v. The number of pumps for which leaks were detected as described in Conditions IV.4.c, V.6, and V.7.
 - vi. The number of pumps for which leaks were not repaired as required in Condition III.6.
 - vii. The number of compressors for which leaks were detected as described in Condition III.19.
 - viii. The number of compressors for which leaks were not repaired as required in Condition III.6.
 - ix. The facts that explain each delay of repair and, where appropriate, why a process unit shutdown was technically infeasible.
 - c. The dates of process unit shutdowns which occurred within the semi-annual reporting period.
 - d. Revisions to the number of valves, pumps, compressors, and pressure relief devices reported in the initial report if changes have occurred since the initial report or subsequent revisions to the initial report.

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

5. The permittee shall submit an initial semiannual report. The report shall be postmarked or received by the appropriate AQD's District Office by January 30 for the reporting period of July 1 to December 31 and July 30 for the reporting period of January 1 to June 30. The semiannual report shall contain the following information: **(40 CFR 60.487a(a) and (b), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a) and (e))**
 - a. The process unit identification.
 - b. Number of valves subject to the requirements of 482-7(a), excluding those valves designated for no detectable emissions under the provision of 482-7a(f).

- c. Number of pumps subject to the requirements of 482-2a, excluding those pumps designated for no detectable emissions under the provisions of 482-2a(e) and those pumps complying with 482-3a(h).
 - d. Number of connectors subject to the requirements of 482-11a.
6. The permittee shall submit semiannual reports. The reports shall be postmarked or received by the appropriate AQD's District Office by January 30 for the reporting period of July 1 to December 31 and July 30 for the reporting period of January 1 to June 30. All semiannual reports shall contain the following information: **(40 CFR 60.487a(c), 40 CFR 60.5400(e))**
- a. Process unit identification;
 - b. For each month during the semiannual reporting period:
 - i. The number of valves for which leaks were detected as described in Conditions V.15, V.19, and V.20.
 - ii. The number of valves for which leaks were not repaired as required in Condition III.7.
 - iii. The number of pumps for which leaks were detected as described in Conditions IV.5.c, V.6, and V.7.
 - iv. The number of pumps for which leaks were not repaired as required in Condition III.7.
 - v. The number of compressors for which leaks were detected as described in Condition III.23.
 - vi. The number of compressors for which leaks were not repaired as required in Condition III.7.
 - vii. The number of connectors for which leaks were detected as described in Condition V.24.
 - viii. The number of connectors for which leaks were not repaired as required in Condition III.7.
 - c. Dates of process unit shutdowns which occurred within the semiannual reporting period.
 - d. Revisions to items reported if changes have occurred since the initial report or subsequent revisions to the initial report.
7. The permittee shall notify the AQD no less than 90 days prior to electing to comply with the alternative standard for valves in Conditions V.10-12. **(40 CFR 60.483-1(b)(1), 40 CFR 60.483-2(a)(2), 40 CFR 60.487(d))**
8. The permittee shall notify the AQD no less than 90 days prior to electing to comply with the alternative standard for valves in Conditions V.18-20. **(40 CFR 60.483-1a(b)(1), 40 CFR 60.483-2a(a)(2), 40 CFR 60.487a(d), 40 CFR 60.5400(e))**

See Appendix 8

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 Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENT(S)

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after January 20, 1984 and on or before August 23, 2011.

- 1. When a leak is detected from a pump in light liquid service, a valve in gas/vapor service or light liquid service, or a compressor, a weatherproof and readily visible identification, marked with the equipment identification number, shall be attached to the leaking equipment. The identification on a valve may be removed after it has been monitored for 2 successive months as specified in Condition V.8 and no leaks have been detected during those 2 months. The identification on pumps and compressors may be removed after it has been repaired. **(40 CFR 60.486(b), 40 CFR 60.632(e))**

2. The permittee shall maintain and follow an AQD approved VOC Leak Detection plan. Any updates and modifications to the plan shall be submitted to the AQD for approval.² **(40 CFR, Part 60, Subpart KKK)**
3. The permittee shall maintain a written plan that requires monitoring unsafe-to-monitor valves as frequently as practicable during safe-to-monitor times and difficult-to-monitor valves in gas/vapor service or in light liquid service at least once per calendar year. **(40 CFR 60.482-7(g)(2), 40 CFR 60.482-7(h)(3), 40 CFR 60.632(a))**
4. The permittee shall maintain a written plan that requires monitoring of pumps in light liquid service that are unsafe-to-monitor as frequently as practicable during safe-to-monitor times. **(40 CFR 60.482-2(g)(2), 40 CFR 60.632(a))**
5. The permittee shall comply with the applicable requirements of 40 CFR, Part 60, Subpart KKK – Standards of Performance for Equipment Leaks of VOC from Onshore Natural Gas Processing Plants for Which Construction, Reconstruction, or Modification Commenced After January 20, 1984, and on or Before August 23, 2011. **(40 CFR, Part 60, Subpart KKK)**
6. For any pump in light liquid service and any valve in gas/vapor service and in light liquid service that is unsafe-to-monitor, the permittee shall demonstrate that the pump or valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Conditions V.4, V.5 and V.8. **(40 CFR 60.482-2(g)(1), 40 CFR 60.482-7(g)(1), 40 CFR 60.632(a))**
7. Any valve in gas/vapor service or light liquid service that is designated as difficult-to-monitor is exempt from the requirements of Condition V.8 if: **(40 CFR 60.482-7(h), 40 CFR 60.632(a))**
 - a. The permittee can demonstrate that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface;
 - b. The process unit within which the valve is located either becomes an affected facility through 40 CFR 60.14 or 60.15 or the permittee designates less than 3.0 percent of the total number of valves as difficult-to-monitor, and
 - c. The permittee follows a written plan that requires monitoring of the valve at least once per calendar year.

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

8. When a leak is detected from a pump in light liquid service, a valve in gas/vapor service or light liquid service, a compressor, or a connector in gas/vapor service or light liquid service, a weatherproof and visible identification marked with the equipment identification number, shall be attached to the leaking equipment. The identification on a valve may be removed after it has been monitored for 2 successive months as specified in Condition V.15 and no leak has been detected during those 2 months. The identification on a connector may be removed after it has been monitored as specified in Conditions V.24 and V.25 and no leak has been detected during that monitoring period. The identification equipment, except on a valve or connector, may be removed after it has been repaired. **(40 CFR 60.486a(b), 40 CFR 60.5400(e))**
9. For any pump in light liquid service, any valve in gas/vapor service or in light liquid service, and any connector that is unsafe-to-monitor, the permittee shall demonstrate that the pump, valve, or connector is unsafe to monitor because monitor personnel would be exposed to an immediate danger as a consequence of complying with Conditions V.6, V.7, V.15, V.16, V.24, and V.25. **(40 CFR 60.482-2a(g)(1), 40 CFR 60.482-7a(g)(1), 40 CFR 60.482-11a(e)(1), 40 CFR 60.5400(a))**
10. The permittee shall maintain a written plan that requires monitoring of pumps in light liquid service that are unsafe-to-monitor as frequently as practicable during safe-to-monitor times. **(40 CFR 60.482-2a(g)(2), 40 CFR 60.5400(a))**
11. The permittee shall maintain a written plan that requires monitoring of connectors in gas/vapor service or light liquid service that are unsafe-to-monitor as frequently as practicable during safe-to-monitor times but not more frequently than the periodic monitoring schedule otherwise applicable, and repair of the equipment according to the procedures specified in Condition III.7 if a leak is detected. **(40 CFR 60.482-11a(e)(2), 40 CFR 60.5400(a))**

12. Any valve in gas/vapor service or in light liquid service that is designated as difficult-to-monitor or unsafe-to-monitor is exempt from the requirements of Condition V.15 if: **(40 CFR 60.482-7a(g) and (h), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**
 - a. The permittee can demonstrate that the difficult-to-monitor valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface;
 - b. The process unit within which the difficult-to-monitor valve is located becomes an affected facility through 40 CFR 60.14 or 60.15 or the permittee designates less than 3.0 percent of the total number of valves as difficult-to-monitor, and
 - c. The permittee follows a written plan that requires monitoring of the difficult-to-monitor valve at least once per calendar year;
 - d. The permittee demonstrates that the valve is unsafe-to-monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Condition V.15;
 - e. The permittee follows a written plan that requires monitoring of the unsafe-to-monitor valve as frequently as practicable during safe-to-monitor times.

13. Any connector in gas/vapor service or light liquid service that is inaccessible is exempt from the monitoring requirements of Conditions V.24 and V.25 and the leak repair requirements of Condition III.7. An inaccessible connector is one that meets any of the following: **(40 CFR 60.482-11a(f)(1), 40 CFR 60.5400(a))**
 - a. Buried;
 - b. Insulated or in a manner that prevents access to the connector by a monitor probe;
 - c. Obstructed by equipment or piping that prevents access to the connector by a monitor probe;
 - d. Unable to be reached from a wheeled scissor-lift or hydraulic-type scaffold that would allow access to connectors up to 25 feet above the ground;
 - e. Inaccessible because it would require elevating the monitoring personnel more than 7 feet above a permanent support surface or would require the erection of scaffold; or
 - f. Not able to be accessed at any time in a safe manner to perform monitoring.

14. The permittee shall comply with the applicable requirements of 40 CFR, Part 60, Subpart OOOO – Standards of Performance for Crude Oil and Natural Gas Production, Transmission and Distribution. **(40 CFR, Part 60, Subpart OOOO)**

Footnotes:

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

²This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

**EU-KGPN-TURB-C
 EMISSION UNIT CONDITIONS**

DESCRIPTION

A 60.2 MMBtu per hour natural gas fired turbine and 28.0 MMBtu per hour natural gas-fired duct burner in the waste heat recovery unit. The turbine is used for plant electrical production and the WHRU is used to heat thermal oil for other processes.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

Low NO_x burners

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
1. NO _x	1.2 lb/MW-hr ²	Test Protocol*	EU-KGPN-TURB-C	Conditions V.1 and V.2	40 CFR 60.4320(a)

* Test protocol will specify averaging time

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
1. Natural Gas	Total potential sulfur emissions less than or equal to 0.060 lb SO ₂ /MMBtu heat input ²	NA	EU-KGPN-TURB-C	Condition VI.1	40 CFR 60.4330(a)(2)

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The permittee shall burn only natural gas in EU-KGPN-TURB-C.² **(R 336.1225, R 336.1702(a))**
2. The permittee shall operate and maintain EU-KGPN-TURB-C in a manner consistent with good air pollution control practices for minimizing emissions at all times including during startup, shutdown, and malfunction. **(40 CFR 60.4333(a))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

1. The permittee shall equip and maintain EU-KGPN-TURB-C with a low NO_x burner.² **(40 CFR 60.4320(a))**
2. The permittee shall install, calibrate, maintain and operate in a satisfactory manner a device to monitor and record the natural gas usage for EU-KGPN-TURB-C on a continuous basis. **(R 336.1213(3)(b))**

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall perform annual performance tests in accordance with 40 CFR 60.4400 to demonstrate continuous compliance with the NO_x emission limit listed in Condition I.1. **(40 CFR 60.4340(a))**
2. If the NO_x emission result from testing is less than or equal to 0.9 lb/MW-hr., the frequency of testing can be reduced to once every 2 years (but no more than 26 months between tests). If the results of any subsequent performance test exceed 0.9 lb/MW-hr., annual performance testing shall be resumed. **(40 CFR 60.4340(a))**

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall maintain records of the fuel quality characteristics in a current, valid purchase contract, tariff sheet or transportation contract to demonstrate that the natural gas potential sulfur emissions do not exceed 0.060 lb SO₂/MMBtu heat input.² **(40 CFR 60.4360, 40 CFR 60.4365, R 336.1213(3)(b))**
2. The permittee shall keep, in a satisfactory manner, monthly records of the amount of fuel combusted in the duct burner for EU-KGPN-TURB-C.² **(R 336.1225, R 336.1702(a), R 336.1213(3)(b))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**
4. The permittee shall submit two complete test protocols to the AQD, one to the Technical Programs Unit Supervisor and one to the District Supervisor for approval at least 30 days prior to the anticipated test date. The protocols shall describe the test method(s) and the maximum routine operating conditions including targets for key operational parameters associated with pollution control equipment to be monitored and recorded during testing.² **(R 336.2001(3), R 336.1213(3))**
5. The permittee shall notify the AQD Technical Programs Unit Supervisor and District Supervisor no less than 7 days prior to the anticipated test date. **(R 336.2001(4), R 336.1213(3))**
6. The permittee shall submit two complete test reports of the test results to the AQD, one to the Technical Programs Unit and one to the District Supervisor, within 60 days following the last date of the test.² **(40 CFR 4375(b), R 336.2001(5), R 336.1213(3))**

See Appendix 8

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 Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV-KGPN-TURB-C-BYPASS	48 ²	48 ²	R 336.1225, 40 CFR 52.21(c) and (d)
2. SV-KGPN-TURB-C-WHRU	48 ²	48 ²	R 336.1225, 40 CFR 52.21(c) and (d)

IX. OTHER REQUIREMENT(S)

1. The permittee shall comply with the applicable requirements of 40 CFR, Part 60, Subpart KKKK – Standards of Performance for Stationary Combustion Turbines. **(40 CFR, Part 60, Subpart KKKK)**

Footnotes:

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

²This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

**EU-KGPS
 EMISSION UNIT CONDITIONS**

DESCRIPTION

An idled refrigerated lean oil absorption natural gas liquid recovery process consisting of a lean oil absorber, a rich oil demethanizer, and a rich oil still to separate the natural gas liquids from the lean oil. This is a closed system. Additional components of the emission unit, including the pressurized natural gas storage tanks, heat medium heater, fuel gas system, and flare system, are operated in support of the operation of EU-KGPN.

Flexible Group ID: NA

POLLUTION CONTROL EQUIPMENT

KGPS flare for upsets/emergencies

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The closed vent system and flare shall be operated at all times when emissions may be vented to them. **(40 CFR 60.482-10a(m), 40 CFR 60.5400(a))**

Leak Detection and Repair for Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

2. When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 days after it is detected, except as provided in Conditions III.18-23 (Delay of Repair). A first attempt at repair shall be made no later than 5 calendar days after each leak is detected. **(40 CFR 60.482-2a(c), 40 CFR 60.482-3a(g), 40 CFR 60.482-8a(c), 40 CFR 60.482-11a(d), 40 CFR 60.483-1a(b)(3), 40 CFR 60.482-7a(d), 40 CFR 60.5400(a), 40 CFR 60.5400 (b))**
3. If evidence of a potential leak is found by visual, audible, olfactory, or any other detection method at pressure relief devices in light liquid service, the permittee shall monitor the equipment within 5 days or eliminate the visual, audible, olfactory, or other indication of a potential leak within 5 calendar days of detection. **(40 CFR 60.482-8a(a), 40 CFR 60.5400(a))**

4. If any inaccessible connector in gas/vapor service or light liquid service is observed by visual, audible, olfactory, or other means to be leaking, the visual, audible, olfactory, or other indications of a leak to the atmosphere shall be eliminated as soon as practicable. **(40 CFR 60.482-11a(f)(2), 40 CFR 60.5400(a))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

5. Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed. **(40 CFR 60.482-6a(b), 40 CFR 60.5400(a))**
6. When a double block-and-bleed system is used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with Condition IV.1 at all other times. **(40 CFR 60.482-6a(c), 40 CFR 60.5400(a))**
7. Any valve in gas/vapor or light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Conditions V.4 and V.5 provided that the valve has no external actuating mechanism in contact with the process fluid and is operated with emissions less than 500 ppm above background. **(40 CFR 60.5400(a), 40 CFR 60.482-7a(f)(1), 40 CFR 60.482-7a(f)(2))**
8. The permittee may elect to comply with an allowable percentage of valves leaking of equal to or less than 2.0 percent. **(40 CFR 60.483-1a(a), 40 CFR 60.483-1a(d), 40 CFR 60.5400(b))**

Compressors for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

9. Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of VOC to the atmosphere, except as provided in Conditions III.11 and V.1. The barrier fluid system shall be in heavy liquid service or shall not be in VOC service. Each compressor seal system shall be : **(40 CFR 60.482-3a(a), (b), and (c), 40 CFR 60.5400(a))**
 - a. Operated with a barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or
 - b. Equipped with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system connected by a closed vent system to a control device that complies with the requirements of 60.482-10a; or
 - c. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
10. Each compressor barrier fluid system as described in Condition III.9 shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both. Each sensor shall be checked daily or shall be equipped with an audible alarm. Based on design considerations and operating experience, the permittee shall determine a criterion that indicates failure of the seal system, barrier fluid system, or both. If the sensor indicates failure of the seal system, barrier fluid system, or both based on the established criterion, a leak is detected. **(40 CFR 60.482-3a(d), (e), and (f), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**
11. Any compressor that is designated for no detectable emissions as indicated by an instrument reading of less than 500 ppm above background is exempt from the requirements of Conditions III.9 and III.10 if the compressor is demonstrated to be operating with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.482-3a(i)(1), 40 CFR 60.5400(a))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

12. Except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.482-4a(a), 40 CFR 60.5400(a))**

13. After each pressure release, the pressure relief shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background as soon as practicable but no later than 5 calendar days after the pressure release, except as provided in Conditions III.18 and III.19. **(40 CFR 60.482-4a(b)(1), 40 CFR 60.5400(a))**
14. Any pressure relief device that is routed to a process or fuel gas system or equipped with a closed vent system capable of capturing and transporting leakage through the pressure relief device to a control device is exempted from the requirements of Conditions III.12, III.13 and V.11. **(40 CFR 60.482-4a(c), 40 CFR 60.5400(a))**
15. Any pressure relief device that is equipped with a rupture disk upstream of the pressure relief device is exempt from the requirements of Conditions III.12, III.13, and V.11 provided that a new rupture disk is installed upstream of the pressure relief device as soon as practicable but no later than 5 calendar days after each pressure release, except as provided in in Conditions III.18 and III.19. **(40 CFR 60.482-4a(d), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

16. Any pump in light liquid service that is designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Conditions V.2, V.3, and IV.2 provided that the pump has no externally actuated shaft penetrating the pump housing and is demonstrated to be operating with no detectable emissions. **(40 CFR 60.482-2a(e), 40 CFR 60.5400(a))**
17. Any pump in light liquid service that is equipped with a closed vent system capable of capturing and transporting any leakage from the seal or seals to a process or to a fuel gas system or a control device is exempt from the requirements of Conditions V.2, V.3, and IV.2. **(40 CFR 60.482-2a(f), 40 CFR 60.5400(a))**

Delay of Repair for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

18. The delay or repair for which leaks have been detected will be allowed if repair within 15 days is technically infeasible without a process unit shutdown. Repair of the equipment shall occur before the end of the next process unit shutdown. Monitoring to verify repair must occur within 15 days after startup of the process unit. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(a))**
19. The delay of repair of equipment will be allowed for equipment which is isolated from the process and which does not remain in VOC service. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(b))**
20. Delay of repair for valves and connectors will be allowed if: **(40 CFR 60.5400(a), 40 CFR 60.482-9a(c))**
 - a. The permittee demonstrates that emissions of purged material resulting from the immediate repair are greater than the fugitive emissions likely to result from the delay of repair; and
 - b. When repair procedures are effected, the purged material is collected and destroyed or recovery in a control device complying with 40 CFR 60.482-10a.
21. Delay of repair beyond a process unit shutdown will be allowed for a valve, if the valve assembly replacement is necessary during the process unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the next process unit shutdown will not be allowed unless the next process unit shutdown occurs sooner than 6 months after the first process unit shutdown. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(e))**
22. Delay of repair for pumps will be allowed if repair requires the use of a dual mechanical seal system that includes a barrier fluid system and repair is completed as soon as practicable, but not later than 6 months after the leak was detected. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(d))**

23. When delay of repair is allowed for a leaking pump, valve, or connector that remains in service, the pump, valve, or connector may be considered to be repaired and no longer subject to delay of repair requirements if 2 consecutive monthly monitoring instrument readings are below the leak definition. **(40 CFR 60.5400(a), 40 CFR 60.482-9a(f))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

Open-Ended Valves or Lines for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

1. Except as provided in 40 CFR 60.482-6a(d), each open-ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve. The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations required process fluid flow through the open ended valve or line. **(40 CFR 60.482-6a(a), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

2. Each pump in light liquid service equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of Conditions V.2 and V.3, provided that the pump meets the following: **(40 CFR 60.482-2a(d)(1), (2), (3), (4), and (5), 40 CFR 60.5400(a))**
- a. Each dual mechanical seal system is:
 - i. Operated with no barrier fluid at a pressure that is all times greater than the pump stuffing box pressure, or
 - ii. Equipped with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed vent system to a control device that complies with the requirements of 40 CFR 60.482-10, or
 - iii. Equipped with a system that purges the barrier fluid into a process stream with zero VOC emissions to the atmosphere.
 - b. The barrier fluid system is in heavy liquid service or is not in VOC service;
 - c. Each barrier fluid system is equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.
 - i. Each sensor shall be checked daily or equipped with an audible alarm;
 - ii. The permittee determines, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both;
 - iii. If the sensor indicates failure of the seal system, the barrier fluid system, or both, based on criterion established, a leak is detected and shall be repaired as specified in Condition III.2.
 - d. Each pump is checked by visual inspection, each calendar week, for indications of liquids dripping from the pump seals. If there are indications of liquids dripping from the pump seal at the time of the weekly inspection, the permittee shall perform the following procedures prior to the next required inspection.
 - i. Monitor the pump within 5 business days to determine if there is a leak of VOC in the barrier fluid, or
 - ii. Designate the visual indications of liquids dripping as a leak.

V. TESTING/SAMPLING

Records shall be maintained on file for a period of 5 years. **(R 336.1213(3)(b)(ii))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

1. Each pump in light liquid service, each compressor, and each valve in gas/vapor service and in light liquid service designated for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background shall be tested for compliance initially upon designation, annually, and at other times requested by the AQD. **(40 CFR 60.482-2a(e), 40 CFR 60.482-3a(i)(2), 40 CFR 60.482-7a(f)(3), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**

Pumps in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

2. Except as provided in Conditions III.16, III.17, and IV.2, each pump in light liquid service shall be monitored monthly to detect leaks. A pump that begins operation in light liquid service after the initial startup date of the process unit must be monitored for the first time within thirty days after the end of its startup period except for a pump that replaces a leaking pump and except as provided in Condition III.16, III.17, and IV.2. A leak is detected when an instrument reading of 2,000 ppm or greater is measured. **(40 CFR 60.482-2a(b)(1)(ii), 40 CFR 60.5400(a))**
3. Each pump in light liquid service shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. If liquids are dripping from the pump seal, the permittee shall either designate the visual indications as a leak and repair the leak within 15 days of detection by eliminating the visual indications of liquids dripping or monitor the pump within 5 days and repair the leak using the procedures in Condition III.2. **(40 CFR 60.482-2a(a)(2), 40 CFR 60.482-2a(b)(2), 40 CFR 60.482-2a(d)(4), 40 CFR 60.5400(a))**

Valves in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

4. Except as provided in Conditions III.7, V.6, V.7, V.8, IX.2, or IX.5, each valve in gas/vapor service shall be monitored monthly to detect leaks. A leak is detected when an instrument reading of 500 ppm or greater is measured. If a leak is not detected for 2 successive months, the valve may be monitored the first month of every quarter, beginning the next quarter, until a leak is detected. As an alternative to monitoring all of the valves in the first month of the quarter, the permittee may elect to subdivide the process unit into two or three subgroups and monitor each subgroup in a different month during the quarter, provided each subgroup is monitored every three months. When a leak is detected, the valve shall be monitored monthly until a leak is not detected for 2 successive months. The permittee may elect to comply with the alternative work practices specified in Conditions V.8 and V.9. **(40 CFR 60.482-7a(1), 40 CFR 60.482-7a(b), 40 CFR 60.482-7a(c)(1)(i) and (ii), 40 CFR 60.482-7a(c)(2), 40 CFR 60.482-3a(a)(1), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**
5. Except for a valve that replaces a leaking valve and except as provided in Conditions III.7, V.6, V.7, V.8, IX.2, or IX.5, a valve that begins operation in gas/vapor service or light liquid service after the initial startup date for the process unit must be: **(40 CFR 60.482-7a(a)(2), 40 CFR 60.5400(a))**
 - a. Monitored as in Condition V.4. The valve must be monitored for the first time within 30 days after the end of its startup period to ensure proper installation; or
 - b. If the existing valves in the process unit are monitored in accordance with Conditions III.8, V.8, or V.9, count the new valve as leaking when calculating the percentage of valves leaking as described in 483-2a(b)(5). If less than 2.0 percent of the valves are leaking for that process unit, the valve must be monitored for the first time during the next scheduled monitoring event for existing valves in the process unit or within 90 days, whichever comes first.
6. Any valve in gas/vapor or light liquid service that is designated as unsafe-to-monitor shall be monitored as frequently as practicable during safe-to-monitor times and any valve that is designated as difficult-to-monitor shall be monitored at least once per calendar year. **(40 CFR 60.482-7a(g)(2), 40 CFR 60.482-7a(h)(3), 40 CFR 60.5400(a))**
7. If electing to comply with Condition III.8 for valves, the permittee shall monitor for leaks initially upon designation, annually, and at other times requested by the AQD. **(40 CFR 60.483-1a(b)(2), 40 CFR 60.5400(b))**
8. After initially complying with Condition V.4 for 2 consecutive quarterly leak detection periods with the percent of valves leaking equal to or less than 2.0, the permittee may begin to skip one of the quarterly leak detection periods for the valves in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.4 but may elect to use this section again. **(40 CFR 60.483-2a(a), 40 CFR 60.483-2a(b)(1), 40 CFR 60.483-2a(2), 40 CFR 60.483-2a(4), 40 CFR 60.5400(b))**

9. After initially complying with Conditions V.4 and V.8 for 5 consecutive quarterly leak detection periods with the percent valves equal to or less than 2.0, the permittee may begin to skip three of the quarterly leak detection periods for the valves in in gas/vapor or light liquid service. If the percent of valves leaking is greater than 2.0, the permittee shall comply with Condition V.4 but may elect to use this section again. **(40 CFR 60.483-2a(a), 40 CFR 60.483-2a(b)(1), 40 CFR 60.483-2a(3), 40 CFR 60.483-2a(4), 40 CFR 60.5400(b))**
10. A valve that begins operation in gas/vapor service or light liquid service after the initial startup date for a process unit following one of the alternative standards in this section must be monitored in accordance with Conditions V.4 and V.5 before the provisions of Condition V.8 and V.9 can be applied to that valve. **(40 CFR 60.483-2a(b)(7), 40 CFR 60.5400(b))**

Pressure Relief Devices in Gas/Vapor Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

11. No later than 5 calendar days after a pressure release, the pressure relief device in gas/vapor service shall be monitored to confirm the conditions of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background. **(40 CFR 60.5400(a), 40 CFR 60.482-4a(b)(2))**

Connectors in Gas/Vapor Service and in Light Liquid Service for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

12. The permittee shall initially monitor all connectors in the process unit for leaks by the later of either 12 months after the compliance date or 12 months after the initial startup. A leak is detected if an instrument reading of greater than or equal to 500 ppm is measured. If all connectors in the process unit have been monitored for leaks prior to the compliance date, no initial monitoring is required provided either no process changes have been made since the monitoring or the permittee can determine that the results of the monitoring, with or without adjustments, reliably demonstrate compliance despite process changes. If required to monitor because of a process change, the permittee is required to monitor only those connectors involved in the process change. **(40 CFR 60.482-11a(a), 40 CFR 60.482-11a(b)(2), 40 CFR 60.482-1a(a), 40 CFR 60.5400(a))**
13. The permittee shall perform monitoring, subsequent to the initial monitoring required in Condition V.12. The required period in which monitoring must be conducted shall be determined by the following schedule using the monitoring results from the preceding monitoring period. If a connector is found to be leaking, it shall be re-monitored once within 90 days after repair to confirm that it is not leaking: **(40 CFR 60.482-11a(b)(3), 40 CFR 60.482-11a(b)(3)(iv), 40 CFR 60.5400(a))**
 - a. If the percent leaking connectors in the process unit were greater than or equal to 0.5 percent, then monitor within 12 months (1 year).
 - b. If the percent leaking connectors in the process unit was greater than or equal to 0.25 percent but less than 0.5, then monitor within 4 years. The permittee may comply with the requirements of this paragraph by monitoring at least 40 percent of the connectors within 2 years of the start of the monitoring period, provided all connectors have been monitored by the end of the 4 year monitoring period.
 - c. If the percent leaking connectors in the process unit was less than 0.25 percent, then monitor as at least 50 percent of the connectors within four years of the start of the monitoring period, and
 - i. If the percent of leaking connectors calculated from the monitoring results is greater than or equal to 0.35 percent of the monitored connectors, the permittee shall monitor as soon as practical, but within the next 6 months, all connectors that have not yet been monitored during the monitoring period. At the conclusion of monitoring, a new monitoring period shall be started based on the percent of leaking connectors within the total monitored connectors; or
 - ii. If the percent of leaking connectors calculated from the monitoring results is less than 0.35 percent of the monitored connectors, the permittee shall monitor all connectors that have not yet been monitored within eight years of the start of the monitoring period.

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of 5 years. **(R 336.1213(3)(b)(ii))**

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

1. The following information pertaining to all equipment subject to the requirements of 40 CFR 60.482-1a to 60.482-10a shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(e), 40 CFR 60.5400(e))**
 - a. A list of identification numbers for equipment subject to the requirements of 40 CFR, Part 60, Subparts VVa and OOOO.
 - b. A list of identification numbers for equipment that are designated for no detectable emissions under the provisions of Conditions III.7, III.11, and III.16.
 - c. The designation of equipment as subject to the requirements of Conditions III.7, III.11, and III.16 shall be signed by the permittee.
 - d. A list of equipment identification numbers for pressure relief devices required to comply with Conditions III.12, III.13, and V.11.
 - e. The dates of each compliance test as required in Condition V.1.
 - f. The background level measured during each compliance test.
 - g. The maximum instrument reading measured at the equipment during each compliance test.
 - h. A list of identification numbers for equipment in vacuum service.
 - i. The date and results of the weekly visual inspection for indications of liquids dripping from pumps in light liquid service.
 - j. Records of the information for monitoring instrument calibrations conducted:
 - i. Date of calibration and initials of the operator performing the calibration.
 - ii. Calibration gas cylinder identification, certification date, and certified concentration.
 - iii. Instrument scale(s) used.
 - iv. A description of any corrective action taken if the meter readout could not be adjusted to correspond to the calibration gas value.
 - v. Results of each calibration drift assessment.
 - k. The connector monitoring schedule for each process unit as specified in Conditions V.12 and V.13.
 - l. Records of the release from a pressure relief device subject to Condition III.13.
2. When a leak is detected from a pump in light liquid service, a compressor, a valve in gas/vapor service or light liquid service, a pressure relief device in light liquid service, or connectors, the following information shall be recorded in a log and shall be kept in a readily accessible location: **(40 CFR 60.486a(c), 40 CFR 60.5400(e))**
 - a. The instrument and operator identification numbers and the equipment identification number.
 - b. The date the leak was detected and the dates of each attempt to repair the leak.
 - c. Repair methods applied in each attempt to repair the leak.
 - d. Maximum instrument reading measured at the time the leak is successfully repaired or determined non-repairable, except when a pump is repaired by eliminating indications of liquids dripping.
 - e. "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.
 - f. The signature of the owner or operator whose decision it was that repair could not be affected without a process unit shutdown.
 - g. The expected date of successful repair of the leak if a leak is not repaired within 15 calendar days.
 - h. Dates of process unit shutdowns that occur while the equipment is unrepaired.
 - i. The date of successful repair of the leak.
3. The following information pertaining to all valves subject to Conditions V.6 and IX.5 and all pumps and connectors subject to the requirements of Condition IX.2 shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(f), 40 CFR 60.5400(e))**
 - a. A list of identification numbers for valves, pumps, and connectors that are designated as unsafe to monitor, an explanation for each valve, pump, or connector stating why the valve, pump, or connector is unsafe-to-monitor, and the plan for monitoring each valve, pump, or connector.

- b. A list of identification numbers for valves that are designated as difficult-to-monitor, an explanation for each valve stating why the valve is difficult-to-monitor, and the schedule for monitoring each valve.
4. The permittee shall record a schedule of monitoring and the percent of valves found leaking during each monitoring period for valves complying with Conditions V.8 and V.9. **(40 CFR 60.486a(g), 40 CFR 60.5400(e))**
5. The following information shall be recorded in a log that is kept in a readily accessible location: **(40 CFR 60.486a(h), 40 CFR 60.5400(e))**
 - a. Design criterion required in Conditions IV.2 and III.10 and explanation of the design criterion.
 - b. Any changes to the criterion and the reason for the changes.
6. The permittee shall keep the following information for closed vent systems and flares described in 60.482-10 in a readily accessible location: **(40 CFR 60.486a(d), 40 CFR 60.5400(e))**
 - a. Detailed schematics, design specifications, and piping and instrumentation diagrams.
 - b. The dates and descriptions of any changes in the design specifications.
 - c. A description of the parameter(s) monitored as required by 40 CFR 60.482-10(e), to ensure the control devices are operated and maintained in conformance with the design and an explanation of why that parameter(s) was selected for the monitoring.
 - d. Periods when the closed vent systems and control devices are not operated as designed, including periods when a flare pilot light does not have a flame.
 - e. Dates of startups and shutdowns of the closed vent systems and control devices.
7. The permittee shall record the following information for each monitoring event required by Conditions V.1, V.2, V.4, V.8, V.9, V.12, and V.13: **(40 CFR 60.486a(a)(3), 40 CFR 60.5400(e))**
 - a. Monitoring instrument identification.
 - b. Operator identification.
 - c. Equipment identification.
 - d. Date of monitoring.
 - e. Instrument reading.
8. The permittee shall keep a record of the start date and end date of each monitoring period for each connector. **(40 CFR 60.482-11a(b)(3)(v), 40 CFR 60.5400(a))**
9. If electing to comply with the alternative monitoring requirements listed in Condition V.4 for valves in gas/vapor service and in light liquid service, the permittee shall keep records of the valves assigned to each subgroup. **(40 CFR 60.482-7a(c)(ii))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**
4. The permittee shall submit an initial semiannual report. The report shall be postmarked or received by the appropriate AQD's District Office by January 30 for the reporting period of July 1 to December 31 and July 30 for the reporting period of January 1 to June 30. The semiannual report shall contain the following information: **(40 CFR 60.487a(a) and (b), 40 CFR 60.5400(a) and (e))**
 - a. The process unit identification.

- b. Number of valves subject to the requirements of 482-7(a), excluding those valves designated for no detectable emissions under the provision of 482-7a(f).
 - c. Number of pumps subject to the requirements of 482-2a, excluding those pumps designated for no detectable emissions under the provisions of 482-2a(e) and those pumps complying with 482-3a(h).
 - d. Number of connectors subject to the requirements of 482-11a.
5. The permittee shall submit semiannual reports. The reports shall be postmarked or received by the appropriate AQD's District Office by January 30 for the reporting period of July 1 to December 31 and July 30 for the reporting period of January 1 to June 30. All semiannual reports shall contain the following information: **(40 CFR 60.487a(c), 40 CFR 60.5400(e))**
- a. Process unit identification.
 - b. For each month during the semiannual reporting period:
 - i. The number of valves for which leaks were detected as described in Conditions V.4, V.8, and V.9.
 - ii. The number of valves for which leaks were not repaired as required in Condition III.2.
 - iii. The number of pumps for which leaks were detected as described in Conditions IV.2, V.2, and V.3.
 - iv. The number of pumps for which leaks were not repaired as required in Condition III.2.
 - v. The number of compressors for which leaks were detected as described in Condition III.10.
 - vi. The number of compressors for which leaks were not repaired as required in Condition III.2.
 - vii. The number of connectors for which leaks were detected as described in Conditions V.12 and V.13.
 - viii. The number of connectors for which leaks were not repaired as required in Condition III.2.
 - c. Dates of process unit shutdowns which occurred within the semiannual reporting period.
 - d. Revisions to items reported if changes have occurred since the initial report or subsequent revisions to the initial report.
6. The permittee shall notify the AQD no less than 90 days prior to electing to comply with the alternative standard for valves in Conditions V.8-9. **(40 CFR 60.483-1a(b)(1), 40 CFR 60.483-2a(a)(2), 40 CFR 60.487a(d), 40 CFR 60.5400(b), 40 CFR 60.5400(e))**

See Appendix 8

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 Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENT(S)

Affected Facilities for which Construction, Reconstruction, or Modification Commenced after August 23, 2011.

- 1. When a leak is detected from a pump in light liquid service, a valve in gas/vapor service or light liquid service, a compressor, or a connector in gas/vapor service or light liquid service, a weatherproof and visible identification marked with the equipment identification number, shall be attached to the leaking equipment. The identification on a valve may be removed after is has been monitored for 2 successive months as specified in Condition V.2 and no leak has been detected during those 2 months. The identification on a connector may be removed after is has been monitored as specified in Conditions V.12 and V.13 and no leak has been detected during that monitoring period. The identification equipment, except on a valve or connector, may be removed after is has been repaired. **(40 CFR 60.486a(b), 40 CFR 60.5400(e))**

2. For any pump in light liquid service, any valve in gas/vapor service or in light liquid service, and any connector that is unsafe-to-monitor, the permittee shall demonstrate that the pump, valve, or connector is unsafe to monitor because monitor personnel would be exposed to an immediate danger as a consequence of complying with Conditions V.1, V.2, V.3, V.4, V.12, and V.13. **(40 CFR 60.482-2a(g)(1), 40 CFR 60.482-7a(g)(1), 40 CFR 60.482-11a(e)(1), 40 CFR 60.5400(a))**
3. The permittee shall maintain a written plan that requires monitoring of pumps in light liquid service that are unsafe-to-monitor as frequently as practicable during safe-to-monitor times. **(40 CFR 60.482-2a(g)(2), 40 CFR 60.5400(a))**
4. The permittee shall maintain a written plan that requires monitoring of connectors in gas/vapor service or light liquid service that are unsafe-to-monitor as frequently as practicable during safe-to-monitor times but not more frequently than the periodic monitoring schedule otherwise applicable, and repair of the equipment according to the procedures specified in Condition III.2 if a leak is detected. **(40 CFR 60.482-11a(e)(2), 40 CFR 60.5400(a))**
5. Any valve in gas/vapor service or in light liquid service that is designated as difficult-to-monitor or unsafe-to-monitor is exempt from the requirements of Condition V.4 if: **(40 CFR 60.482-7a(g) and (h), 40 CFR 60.5400(a))**
 - a. The permittee can demonstrate that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface;
 - b. The process unit within which the valve is located becomes an affected facility through 40 CFR 60.14 or 40 CFR 60.15 or the permittee designates less than 3.0 percent of the total number of valves as difficult-to-monitor;
 - c. The permittee follows a written plan that requires monitoring of the valve at least once per calendar year;
 - d. The permittee demonstrates that the valve is unsafe-to-monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Condition V.4; and
 - e. The permittee follows a written plan that requires monitoring of the unsafe-to-monitor valve as frequently as practicable during safe-to-monitor times.
6. Any connector in gas/vapor service or light liquid service that is inaccessible is exempt from the monitoring requirements of Conditions V.12 and V.13, from the leak repair requirements of Condition III.5. An inaccessible connector is one that meets any of the following: **(40 CFR 60.482-11a(f)(1), 40 CFR 60.5400(a))**
 - a. Buried;
 - b. Insulated or in a manner that prevents access to the connector by a monitor probe;
 - c. Obstructed by equipment or piping that prevents access to the connector by a monitor probe;
 - d. Unable to be reached from a wheeled scissor-lift or hydraulic-type scaffold that would allow access to connectors up to 25 feet above the ground;
 - e. Inaccessible because it would require elevating the monitoring personnel more than 7 feet above a permanent support surface or would require the erection of scaffold; or
 - f. Not able to be accessed at any time in a safe manner to perform monitoring.
7. The permittee shall comply with the applicable requirements of 40 CFR, Part 60, Subpart OOOO – Standards of Performance for Crude Oil and Natural Gas Production, Transmission and Distribution. **(40 CFR, Part 60, Subpart OOOO)**

Footnotes:

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

² This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

D. FLEXIBLE GROUP CONDITIONS

Part D outlines the terms and conditions that apply to more than one emission unit. The permittee is subject to the special conditions for each flexible group in addition to the General Conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply, NA (not applicable) has been used in the table. If there are no special conditions that apply to more than one emission unit, this section will be left blank.

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
FG-KGPS-TURB	Two 19,750 hp natural gas-fired G.E. Frame 5 turbines with 7.5 MW electrical generators and 55 MMBTU per hour natural gas-fired duct burners in the waste heat recovery units. The turbines are used for plant electrical production and the WHRUs are used to heat thermal oil for other processes.	EU-KGPS-TURB-A EU-KGPS-TURB-B
FG-EMERGENS	275 horsepower International Harvester gas-fired emergency generator, 1,090 horsepower Waukesha gas-fired emergency generator, 125 horsepower Cummins gas-fired emergency fire water engine, 145 horsepower Minneapolis Moline gas-fired emergency fire water engine	EU-KGPN-GENERATOR EU-KGPS-GENERATOR EU-KGPN-FIREWATER EU-KGPS-FIREWATER
FG-RULE290	Any existing or future emission unit exempt from R 336.1201 pursuant to R 336.1278 and R 336.1290.	EURULE290

**FG-KGPS-TURB
 FLEXIBLE GROUP CONDITIONS**

DESCRIPTION

19,750 hp natural gas-fired G.E. Frame 5 turbine with a 7.5 MW electrical generator and a 55 MMBTU per hour natural gas-fired duct burner in the waste heat recovery unit. The turbine is used for plant electrical production and the WHRU is used to heat thermal oil for other processes.

Emission Unit: EU-KGPS-TURB-A, EU-KGPS-TURB-B

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
1. Natural gas	0.8 percent by weight total sulfur	NA	FG-KGPS-TURB	Condition VI.5	40 CFR 60.333(b)

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 336.1213(3)(b)(ii))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall use the gas quality characteristics in a current, valid purchase contract, tariff sheet or transportation contract for gaseous fuel, which specifies the maximum total sulfur content to demonstrate compliance with Conditions II.1: **(40 CFR 60.334(h)(3)(i), R 336.1213(3)(b))**
2. The permittee shall monitor and record the natural gas usage for EU-KGPS-TURB-A and EU-KGPS-TURB for each calendar year. **(R 336.1213(3)(b))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

See Appendix 8

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 Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENT(S)

1. The permittee shall comply with all applicable requirements of 40 CFR, Part 60, Subpart GG – Standards of Performance for Stationary Gas Turbines. **(40 CFR, Part 60, Subpart GG)**

Footnotes:

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

² This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

**FG-EMERGENS
 FLEXIBLE GROUP CONDITIONS**

DESCRIPTION

275 horsepower International Harvester gas-fired emergency generator, 1,090 horsepower Waukesha gas-fired emergency generator, 125 horsepower Cummins gas-fired emergency fire water engine, 145 horsepower Minneapolis Moline gas-fired emergency fire water engine

Emission Unit: EU-KGPN-GENERATOR, EU-KGPS-GENERATOR, EU-KGPN-FIREWATER, EU-KGPS-FIREWATER

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMIT(S)

Material	Limit	Time Period / Operating Scenario	Equipment	Monitoring/ Testing Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. There is no time limit on the use of Emergency Stationary RICE in emergency situations. **(40 CFR 63.6640(f)(1))**
2. The engine may operate up to a maximum of 100 hours per calendar year for 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. **(40 CFR 63.6640(f)(2)(i))**
3. The engine may operate up to a maximum of 50 hours per calendar year for non-emergency situations. The 50 hours of operation in non-emergency situations are counted as part of the 100 hours per calendar year for maintenance and testing. **(40 CFR 63.6640(f)(4))**

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

NA

VI. MONITORING/RECORDKEEPING

1. Record the number of hours of engine operation, including the number of hours for emergency and non-emergency operation. **(40 CFR 63.6655(f)(2))**
2. Records of the maintenance conducted on the emergency engine in order to demonstrate compliance with Section IX must be maintained. **(40 CFR 63.6655(e)(3))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

See Appendix 8

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 Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENT(S)

1. Change oil and filter every 500 hours of operation or annually; whichever comes first. Source has the option to utilize an oil analysis program as described in 63.6625(i) or (j) in order to extend the specified oil change requirement. **(40 CFR 63.6603(a), 40 CFR 63.6640(a))**
2. Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first, and replace as necessary. **(40 CFR 63.6603(a), 40 CFR 63.6640(a))**

3. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary. **(40 CFR 63.6603(a), 40 CFR 63.6640(a))**
4. The permittee shall comply with the applicable requirements of 40 CFR 63 Subpart ZZZZ – National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines for Area Sources. **(40 CFR, Part 63, Subpart ZZZZ)**

Footnotes:

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

² This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

FG-RULE 290 FLEXIBLE GROUP CONDITIONS

DESCRIPTION

Any emission unit that emits air contaminants and is exempt from the requirements of Rule 201 pursuant to Rules 278 and 290.

Emission Unit: EU-RULE290

POLLUTION CONTROL EQUIPMENT

NA

I. EMISSION LIMIT(S)

1. Each emission unit that emits only noncarcinogenic volatile organic compounds or noncarcinogenic materials which are listed in Rule 122(f) as not contributing appreciably to the formation of ozone if the total uncontrolled or controlled emissions of air contaminants are not more than 1,000 or 500 pounds per month, respectively. **(R 336.1290(a)(i))**
2. Each emission unit that the total uncontrolled or controlled emissions of air contaminants are not more than 1,000 or 500 pounds per month, respectively, and all the following criteria listed below are met: **(R 336.1290(a)(ii))**
 - a. For noncarcinogenic air contaminants, excluding noncarcinogenic volatile organic compounds and noncarcinogenic materials which are listed in Rule 122(f) as not contributing appreciably to the formation of ozone, with initial threshold screening levels greater than or equal to 2.0 micrograms per cubic meter, the uncontrolled or controlled emissions shall not exceed 1,000 or 500 pounds per month, respectively. **(R 336.1290(a)(ii)(A))**
 - b. For noncarcinogenic air contaminants, excluding noncarcinogenic volatile organic compounds and noncarcinogenic materials which are listed in Rule 122(f) as not contributing appreciably to the formation of ozone, with initial threshold screening levels greater than or equal to 0.04 microgram per cubic meter and less than 2.0 micrograms per cubic meter, the uncontrolled or controlled emissions shall not exceed 20 or 10 pounds per month, respectively. **(R 336.1290(a)(ii)(B))**
 - c. For carcinogenic air contaminants with initial risk screening levels greater than or equal to 0.04 microgram per cubic meter, the uncontrolled or controlled emissions shall not exceed 20 or 10 pounds per month, respectively. **(R 336.1290(a)(ii)(C))**
 - d. The emission unit shall not emit any air contaminants, excluding non-carcinogenic volatile organic compounds and noncarcinogenic materials which are listed in Rule 122(f) as not contributing appreciably to the formation of ozone, with an initial threshold screening level or initial risk screening level less than 0.04 microgram per cubic meter. **(R 336.1290(a)(ii)(D))**
3. Each emission unit that emits only noncarcinogenic particulate air contaminants and other air contaminants that are exempted under Rule 290(a)(i) and/or Rule 290(a)(ii), if all of the following provisions are met: **(R 336.1290(a)(iii))**
 - a. The particulate emissions are controlled by an appropriately designed and operated fabric filter collector or an equivalent control system which is designed to control particulate matter to a concentration of less than or equal to 0.01 pound of particulate per 1,000 pounds of exhaust gases and which does not have an exhaust gas flow rate more than 30,000 actual cubic feet per minute. **(R 336.1290(a)(iii)(A))**
 - b. The visible emissions from the emission unit are not more than 5 percent opacity in accordance with the methods contained in Rule 303. **(R 336.1290(a)(iii)(B))**
 - c. The initial threshold screening level for each particulate air contaminant, excluding nuisance particulate, is more than 2.0 micrograms per cubic meter. **(R 336.1290(a)(iii)(C))**

II. MATERIAL LIMIT(S)

NA

III. PROCESS/OPERATIONAL RESTRICTION(S)

1. The provisions of Rule 290 apply to each emission unit that is operating pursuant to Rule 290. **(R 336.1290)**

IV. DESIGN/EQUIPMENT PARAMETER(S)

NA

V. TESTING/SAMPLING

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall maintain records of the following information for each emission unit for each calendar month using the methods outlined in the DEQ, AQD Rule 290, Permit to Install Exemption Record form (EQP 3558) or an alternative format that is approved by the AQD District Supervisor. **(R 336.1213(3))**
 - a. Records identifying each air contaminant that is emitted. **(R 336.1213(3))**
 - b. Records identifying if each air contaminant is controlled or uncontrolled. **(R 336.1213(3))**
 - c. Records identifying if each air contaminant is either carcinogenic or non-carcinogenic. **(R 336.1213(3))**
 - d. Records identifying the ITSL and IRSL, if established, of each air contaminant that is being emitted under the provisions of Rules 290(a)(ii) and (iii). **(R 336.1213(3))**
 - e. Material use and calculations identifying the quality, nature, and quantity of the air contaminant emissions in sufficient detail to demonstrate that the actual emissions of the emission unit meet the emission limits outlined in this table and Rule 290. **(R 336.1213(3), R 336.1290(c))**
2. The permittee shall maintain an inventory of each emission unit that is exempt pursuant to Rule 290. This inventory shall include the following information. **(R 336.1213(3))**
 - a. The permittee shall maintain a written description of each emission unit as it is maintained and operated throughout the life of the emission unit. **(R 336.1290(b), R 336.1213(3))**
 - b. For each emission unit that emits noncarcinogenic particulate air contaminants pursuant to Rule 290(a)(iii), the permittee shall maintain a written description of the control device, including the designed control efficiency and the designed exhaust gas flow rate. **(R 336.1213(3))**
3. For each emission unit that emits noncarcinogenic particulate air contaminants pursuant to Rule 290(a)(iii), the permittee shall perform a monthly visible emission observation of each stack or vent during routine operating conditions. This observation need not be performed using Method 9. The permittee shall keep a written record of the results of each observation. **(R 336.1213(3))**

VII. REPORTING

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**
2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**
3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

See Appendix 8

VIII. STACK/VENT RESTRICTION(S)

NA

IX. OTHER REQUIREMENT(S)

NA

E. NON-APPLICABLE REQUIREMENTS

At the time of the ROP issuance, the AQD has determined that the requirements identified in the table below are not applicable to the specified emission unit(s) and/or flexible group(s). This determination is incorporated into the permit shield provisions set forth in the General Conditions in Part A pursuant to Rule 213(6)(a)(ii). If the permittee makes a change that affects the basis of the non-applicability determination, the permit shield established as a result of that non-applicability decision is no longer valid for that emission unit or flexible group.

Emission Unit/Flexible Group ID	Non-Applicable Requirement	Justification
EU-KGPN-TURB-C	40 CFR, Part 60, Subpart GG	40 CFR 60.4305(b) states that stationary combustion turbines regulated under 40 CFR, Part 60, Subpart KKKK are exempt from the requirements of 40 CFR, Part 60, Subpart GG.
EU-KGPN-TURB-C	40 CFR, Part 60, Subparts Dc	Duct burners regulated under 40 CFR, Part 60, Subpart KKKK are exempted from the requirements of 40 CFR, Part 60, Subparts Da, Db, and Dc.
FG-KGPS-TURB	40 CFR, Part 60, Subpart Dc	The waste heat recovery units and duct burners were installed prior to the promulgation date (June 9, 1989) of 40 CFR, Part 60, Subpart Dc and no modifications or reconstruction commenced after the promulgation date.

APPENDICES

Appendix 1. Abbreviations and Acronyms

The following is an alphabetical listing of abbreviations/acronyms that may be used in this permit.

AQD	Air Quality Division	MM	Million
acfm	Actual cubic feet per minute	MSDS	Material Safety Data Sheet
BACT	Best Available Control Technology	MW	Megawatts
BTU	British Thermal Unit	NA	Not Applicable
°C	Degrees Celsius	NAAQS	National Ambient Air Quality Standards
CAA	Federal Clean Air Act	NESHAP	National Emission Standard for Hazardous Air Pollutants
CAM	Compliance Assurance Monitoring	NMOC	Non-methane Organic Compounds
CEM	Continuous Emission Monitoring	NOx	Oxides of Nitrogen
CFR	Code of Federal Regulations	NSPS	New Source Performance Standards
CO	Carbon Monoxide	NSR	New Source Review
COM	Continuous Opacity Monitoring	PM	Particulate Matter
department	Michigan Department of Environmental Quality	PM-10	Particulate Matter less than 10 microns in diameter
dscf	Dry standard cubic foot	PM-2.5	Particulate Matter less than or equal to 2.5 microns in diameter
dscm	Dry standard cubic meter	pph	Pound per hour
EPA	United States Environmental Protection Agency	ppm	Parts per million
EU	Emission Unit	ppmv	Parts per million by volume
°F	Degrees Fahrenheit	ppmw	Parts per million by weight
FG	Flexible Group	PS	Performance Specification
GACS	Gallon of Applied Coating Solids	PSD	Prevention of Significant Deterioration
GC	General Condition	psia	Pounds per square inch absolute
gr	Grains	psig	Pounds per square inch gauge
HAP	Hazardous Air Pollutant	PeTE	Permanent Total Enclosure
Hg	Mercury	PTI	Permit to Install
hr	Hour	RACT	Reasonable Available Control Technology
HP	Horsepower	ROP	Renewable Operating Permit
H ₂ S	Hydrogen Sulfide	SC	Special Condition
HVLP	High Volume Low Pressure *	scf	Standard cubic feet
ID	Identification (Number)	sec	Seconds
IRSL	Initial Risk Screening Level	SCR	Selective Catalytic Reduction
ITSL	Initial Threshold Screening Level	SO ₂	Sulfur Dioxide
LAER	Lowest Achievable Emission Rate	SRN	State Registration Number
lb	Pound	TAC	Toxic Air Contaminant
m	Meter	Temp	Temperature
MACT	Maximum Achievable Control Technology	THC	Total Hydrocarbons
MAERS	Michigan Air Emissions Reporting System	tpy	Tons per year
MAP	Malfunction Abatement Plan	µg	Microgram
MDEQ	Michigan Department of Environmental Quality	VE	Visible Emissions
mg	Milligram	VOC	Volatile Organic Compounds
mm	Millimeter	yr	Year

*For HVLP applicators, the pressure measured at the gun air cap shall not exceed 10 pounds per square inch gauge (psig).

Appendix 2. Schedule of Compliance

The permittee certified in this ROP application that this stationary source is in compliance with all applicable requirements of this ROP except for the following: 40 CFR, Part 60, Subpart KKK. As a result, the permittee was required to submit a Schedule of Compliance as defined in Rule 119(a), pursuant to Rule 210(2) and Rule 213(4).

A Schedule of Compliance for any applicable requirements that the permittee is not in compliance with at the time of the ROP issuance is supplemental to, and shall not sanction non-compliance with, the underlying applicable requirements on which it is based.

The permittee shall adhere to this schedule of compliance and submit the required certified progress reports accordingly.

Compliance Plan

The permittee outlined the details of achieving compliance in a narrative compliance plan. The details of the compliance plan are outlined below.

On January 9, 2013 the USEPA issued a Letter of Violation to Merit Energy (now Lambda Energy Resources, LLC) in relation to the leak detection and repair (LDAR) requirements pursuant to 40 CFR, Part 60, Subpart KKK. The violations were discovered during an inspection performed by USEPA staff in November 2012. USEPA and Merit Energy (now Lambda Energy Resources, LLC) are currently negotiating a resolution to the alleged violations.

Schedule of Compliance

The following schedule of compliance conforms with the provisions of Rule 119(a) and Rule 213(4).

Emission Unit/ Flexible Group ID and Condition No.	Applicable Requirement	Remedial Measure	Required Action	Milestone Date	Progress Reports
EU-KGPN	40 CFR, Part 60, Subpart KKK	Proper implementation of leak detection and repair methods.	Resolve the cited violations with USEPA.	Within timeframes established by USEPA	Semiannual updates to MDEQ AQD

Progress Reports

The permittee shall submit Certified Progress Reports to the Cadillac AQD District Supervisor using the MDEQ, AQD, Report Certification form (EQP 5736). Alternative formats must meet the provisions of Rule 213(4)(c) and Rule 213(3)(c)(i), respectively, and be approved by the AQD District Supervisor. **(R 336.1213(4)(b))**

Progress reports shall contain the following information:

The projected dates for achieving scheduled activities, milestones or compliance as required in the schedule of compliance. **(R 336.1213(4)(b)(i))**

The actual dates that the activities, milestones, or compliance are achieved. **(R 336.1213(4)(b)(i))**

An explanation of why any dates in the schedule of compliance were not, or will not be met. **(R 336.1213(4)(b)(ii))**

A description of any preventative or corrective measures adopted in order to ensure that the schedule of compliance is met. **(R 336.1213(4)(b)(ii))**

Appendix 3. Monitoring Requirements

Specific monitoring requirement procedures, methods or specifications are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, this appendix is not applicable.

Appendix 4. Recordkeeping

Specific recordkeeping requirement formats and procedures are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, this appendix is not applicable.

Appendix 5. Testing Procedures

Specific testing requirement plans, procedures, and averaging times are detailed in the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, this appendix is not applicable.

Appendix 6. Permits to Install

The following table lists any PTIs issued or ROP revision applications received since the effective date of the previously issued ROP No. MI-ROP-B4292-2008. Those ROP revision applications that are being issued concurrently with this ROP renewal are identified by an asterisk (*). Those revision applications not listed with an asterisk were processed prior to this renewal.

Source-Wide PTI No MI-PTI-B4292-2008 is being reissued as Source-Wide PTI No. MI-PTI-B4292-2014.

Permit to Install Number	ROP Revision Application Number	Description of Equipment or Change	Corresponding Emission Unit(s) or Flexible Group(s)
NA	NA	NA	NA

Appendix 7. Emission Calculations

Specific emission calculations to be used with monitoring, testing or recordkeeping data are detailed in the appropriate Source-Wide, Emission Unit and/or Flexible group Special Conditions. Therefore, this appendix is not applicable.

Appendix 8. Reporting

A. Annual, Semiannual, and Deviation Certification Reporting

The permittee shall use the MDEQ, AQD, Report Certification form (EQP 5736) and MDEQ, AQD, Deviation Report form (EQP 5737) for the annual, semiannual and deviation certification reporting referenced in the Reporting Section of the Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Alternative formats must meet the provisions of Rule 213(4)(c) and Rule 213(3)(c)(i), respectively, and be approved by the AQD District Supervisor.

B. Other Reporting

Specific reporting requirement formats and procedures are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, Part B of this appendix is not applicable.