DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION ACTIVITY REPORT: On-site Inspection

B756165259

FACILITY: Lambda Energy Resources LLC - Goose Creek		SRN / ID: B7561
LOCATION: County Road 612 (SEC 32 BLUE LAKE TWP), KALKASKA		DISTRICT: Cadillac
CITY: KALKASKA		COUNTY: KALKASKA
CONTACT:		ACTIVITY DATE: 11/01/2022
STAFF: Kurt Childs	COMPLIANCE STATUS: Compliance	SOURCE CLASS: SM OPT OUT
SUBJECT: 2023 FCE.		
RESOLVED COMPLAINTS:		

Full Compliance Evaluation

I conducted a Full Compliance Evaluation (FCE) including site inspection and records review of the Lambda Energy Goose Creek CPF. Records for this facility were requested prior to the inspection which resulted in the determination that the plant has been shut in and did not operate during the past year.

The site inspection was conducted on 11/01/2022 to verify shut in condition and inventory equipment on site. The weather was clear, 60 degrees with light SW winds. No visible emissions were observed from any of the equipment at the facility and no significant odors. This facility is located in an isolated area down an access road on the north side of CR 612 in Kalkaska County.

This facility has an opt-out Permit to Install number 211-07A which imposes certain requirements on the glycol dehydration system and a natural gas fired compressor engine. The compressor engine is an in-line 6-cylinder four stroke, rich burn engine. At the time of the inspection the engine was not running. The engine is not equipped with a catalytic converter. The dehydrator was not operating. There were mild sulfur odors within the compressor building but no odors elsewhere within the plant. This CPF has a flare which was not operating at the time of the inspection.

In addition to the dehydration system and compressor, other equipment I observed at the site includes five tanks with VRU (not running at the time of the inspection), five heaters (none operating), a flare, and other standard CPF equipment. The sign on the plant entrance refers to this as a "sweetening plant". Gas is extracted from the Niagaran formation and can contain H2S. An iron sponge system was in place for the removal of H2S.

Based on observations during the inspection and the records that were submitted, the requirements of PTI 211-07A appear to met as follows:

PTI 211-07A, EUDEHY

- I. Emission Limits.
 - NA, there are no emission limits.
- II. Material Use Limits.
 - NA, there are no material use.
- III. Process Operational Restrictions.
- IV. Design/Equipment Parameters.
- 1. The dehy must not operate unless the flare is installed and operating properly. As indictated, the plant is not currently operating but the flare is in place.

I. Testing/Sampling.

NA

II. Monitoring/Recordkeeping

NA

III. Reporting

NA

- IV. Stack/Vent Restrictions
 - 1. Maximum diameter 6", minimum stack height 37'. The PTI was revised in the past to correct these parameters. The stack as observed at the time of the inspection appeared to meet these limits.
- V. Other Requirements.

NA

EUENGINE1

- I. Emissions
- 1. NOx 35 tpy, 12-mos rolling time period. NA due to shut in.
- 2. CO 35 tpy, 12-mos rolling time period. NA due to shut in.
- II. Material Limits

NA

- III. Process/Operational
- 1. A MAP is required. The AQD approved a MAP on January 4, 2016.
 - 2. Operation of engine without an add-on control device (not more than 200 hrs.). The engine was permitted without the requirement for an add-on control device, so this condition is NA.
- IV. Design/Equipment
 - 1. An add-on control device shall be installed, maintained, and operated properly. The engine does not have an add-on control device, so this condition is NA.
 - V. Testing
 - 1. NOx and CO emissions testing required upon request. The AQD has not requested that Lambda Energy conduct emissions testing of this engine.
 - VI. Monitoring/Recordkeeping
 - 1. Monitor natural gas usage. The engine is equipped with a device to monitor natural gas usage.
 - 2. Calculate emissions each month and maintain records. NA due to shut in.
 - 3. Maintain a Log of all maintenance activities. NA due to shut in.
 - 4. Records of hours the engine is operated without the add-on control device. The engine is not required to have and add-on control device so this requirement is NA.
 - 5. Maintain fuel use records. NA due to shut in.

6 and 7. Maintain records of NOx and CO emissions calculations. NA due to shut in.

VII. Reporting

NA

VIII. Stack Restrictions

1. Maximum diameter 4.5", minimum height 10.5'. The PTI was revised in the past to correct these parameters. The stack as observed at the time of the inspection appeared to meet these limits.

FGFACILITY

All process equipment source-wide including equipment covered by other permits, grand-fathered equipment and exempt equipment.

- I. Emissions
 - 1. NOx Emission limit: 40 tpy, 12-month rolling time period. NA due to shut in.
 - 2. CO Emission limit: 40 tpy, 12-month rolling time period. NA due to shut in.
 - 3. VOC Emission limit: 40 tpy, 12-month rolling time period. NA due to shut in.
- **II. Material Limits**
 - 1. Shall burn only sweet natural gas. The CPF is equipped with and iron sponge to remove H2S.
- III. Process/Operational

NA

IV. Design/Equipment

NA

V. Testing

NA

- VI. Monitoring/Recordkeeping
 - 1. NA due to shut in.
- VII. Reporting

NA

VIII. Stack

NA

IX. Other

1. Comply with 40 CFR Part 63, Subpart HH. Compliance with Subpart HH has not been evaluated since the AQD does not have delegation for this MACT.

Summary

As a result of this Full Compliance Evaluation, it appears the source is currently in compliance with PTI 211-07A and the Air Pollution Control Rules based on its temporary shut in status and observations of the equipment on-site.