

DEPARTMENT OF ENVIRONMENTAL QUALITY  
AIR QUALITY DIVISION  
ACTIVITY REPORT: Scheduled Inspection

B913652617

FACILITY: Lambda Energy Resources LLC - Bear Lake 22		SRN / ID: B9136
LOCATION: 9536 Nine Mile Rd., BEAR LAKE		DISTRICT: Cadillac
CITY: BEAR LAKE		COUNTY: MANISTEE
CONTACT: Vicki Kniss ,		ACTIVITY DATE: 02/26/2020
STAFF: Kurt Childs	COMPLIANCE STATUS: Compliance	SOURCE CLASS: SM OPT OUT
SUBJECT: 2020 FCE		
RESOLVED COMPLAINTS:		

**B9136 Lambda Energy Bear Lake 22**

I conducted a Full Compliance Evaluation of the Lambda Energy Bear Lake 22 CPF including an on-site inspection and records review. The facility is permitted under Permit to Install No. 50-04A. At the time of the inspection no one was on-site, the weather was mostly cloudy, 25 degrees F, 10 mph Northwest winds.

At the time of the inspection the following equipment was observed:

Tank battery with 5 tanks, 2 marked "Crude Oil". There was an operating VRU serving the tank battery. In a separate area of the facility there was also one blow-down tank.

There were 6 heaters, 2 of which were running.

There were 2 compressor buildings but only the "west" building contained a compressor engine (Unit 124C). As observed during the previous inspection the compressor and engine had been removed from the second building which was still empty. Unit 124C was not operating at the time of the inspection

**COMPLIANCE EVALUATION****1. EUBL22DEHY - Glycol dehydration system processing gas from the Niagaran formation.**

1.1 and 1.2. Lambda Energy is not allowed to operate the facility unless a flash tank and condenser are installed and operating in a satisfactory manner. The dehy was not operating at the time of the inspection and there were no signs that it had been operating recently. Records provided by Lambda Energy indicated the dehydrators were out of service.

2. FGBL22COMPS – Two natural gas fired compressor engines used to boost the pressure of the natural gas prior to entering the sales line. As previously indicated, Unit 230 had been permanently shut down in 2007. At the time of the inspection, the remaining Waukesha V-12 engine (Unit 124C) was not operating. There was one small electric motor driven compressor that was operating on a skid located outside the compressor building in a separate small white building.

2.1. A Malfunction Abatement and Preventative Maintenance Plan has been submitted to the AQD. This plan was approved on March 19, 2007 and most recently revised on 7/01/15.

2.2. The permit requires that FG-BL22COMPS not operate unless each 3-way catalyst is installed, maintained, and operated in a satisfactory manner. At the time of the inspection the catalytic converter appeared to be installed on the remaining engine but the engine is not in use at this time.

2.3 and 2.4. Monitoring of natural gas usage is required. The compressor engine was equipped with a flow meter to monitor the natural gas usage, but as indicated, has not been operating. The natural gas usage is recorded monthly and was provided by Lambda Energy. According to the records provided the 12-mos rolling avg. natural gas usage attributed to the heaters averaged around 2 MMcf.

2.5. The permit requires a log of all significant maintenance activities. Lambda Energy provided AQD staff with records of all maintenance activities performed at the CPF which was limited to one day of service on the compressor.

**3. FGBL22TANKS**

3.1 the permit requires that FGBL22TANKS not be operated unless the vapor recovery unit is installed and operating properly. At the time of the inspection a vapor recovery unit was connected to the 5 storage tanks and was operating.

4. FGFACILITY – All process equipment at the facility including equipment covered by other permits, grandfathered equipment and exempt equipment.

4.1a. The nitrogen oxide (NOx) emissions from the facility are limited to 89 tons per 12-month rolling time period. Records submitted by the company (attached) indicate that the only NOx source is the heaters and that the monthly and 12-month rolling time period NOx emissions were around 0.1 tons per 12-mos rolling time period.

4.1b. The carbon monoxide (CO) emissions from the facility are limited to 89 tons per 12-month rolling time period. Records submitted by the company (attached) indicate that the only CO source is the heaters and that monthly and 12-month rolling time period CO emissions were around 0.09 tons per 12-mos. rolling time period.

4.2. The facility is allowed to burn only sweet natural gas. Past gas analysis provided by Lambda Energy have indicated that the gas burned in the facility is sweet.

4.3. Lambda Energy is limited to burning 100,000,000 standard cubic feet of natural gas in FGFACILITY per 12-month rolling time period. As indicated in 2.3 and 2.4, records provided by Lambda Energy indicate fuel usage is in the range of 2 MM SCF per 12-month rolling time period.

4.4, 4.5, and 4.6. The permit requires that monthly NOx and CO emission calculations be completed and available in a format acceptable to the AQD. The records were complete and provided as requested by AQD.

4.7. The permit requires that Lambda Energy maintain records of the monthly and 12-month rolling time period natural gas usage. As indicated above the records are maintained and were provided upon request.

#### OTHER EQUIPMENT

There are 6 various heaters on site and 2 were operating at the time of the inspection. There were no visible emissions from any of the heaters. The heaters are exempt per R 282(b) but fuel use in the heaters is accounted for in FGFACILITY.

#### CONCLUSION

Based upon the on-site inspection and records review, AQD staff believe that the facility is in compliance with applicable state and federal regulations as well as Permit to Install No. 50-04A.

NAME  DATE 3-2-20 SUPERVISOR 