DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION

ACTIVITY REPORT: Scheduled Inspection

B722247737		DEN LIB DEGGG
FACILITY: JAGUAR ENERGY, FREDERIC 15 GAS PLANT		SRN / ID: B7222
LOCATION: 9038 Deward Road, FREDERIC		DISTRICT: Cadillac
CITY: FREDERIC		COUNTY: CRAWFORD
CONTACT:		ACTIVITY DATE: 01/24/2019
STAFF: Chance Collins	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MAJOR
SUBJECT: Scheduled Inspecti	on and Review of Records for FCE	
RESOLVED COMPLAINTS:		

On January 24, 2019, AQD staff traveled to Crawford County to perform an inspection of the Jaguar Energy Frederic 15 Gas Plant. The purpose of the inspection was to determine the facility's compliance with MI-ROP-B7222-2018 and applicable state and federal air pollution control regulations 40 CFR Part 63 Subpart HH and 40 CFR Part 63 Subpart ZZZZ which the DEQ is not delegated to enforce. AQD staff noted that the facility consists of an incinerator, process heaters, a glycol dehydrator, and an Ajax DP-60 60 hp compressor engine.

The Frederic 15 Gas Plant is a natural gas sweetening facility which uses an amine process to remove hydrogen sulfide from the incoming natural gas. Feedstock entering the plant is passed through a heater where small quantities of crude oil are separated and piped to a pressurized vessel for storage. The natural gas is routed to the amine process for hydrogen sulfide removal and a glycol dehydrator for water removal by use of two stage compressor. After sweetening and dehydration, the gas is transferred to the sales pipeline. The hydrogen sulfide laden amine is regenerated by use of a reboiler. Hydrogen sulfide acid gas is then routed to an incinerator for oxidation which converts the acid gas to sulfur dioxide.

AQD staff arrived on site at 10:40 a.m. to snowy conditions with a temperature of 22°F and a WSW wind of 7mph. There were no noticeable odors upon arrival. At time of inspection, the facility was shut down and no equipment on site was in operation. The following discusses the findings of this inspection.

EUSWEETENING

I. Emission Limit

Sulfur Dioxide emissions are limited to 1,332 pounds per day based on a 24-hour average and 55.5 pounds per hour based on a 24-hour average. Data pursuant to these emission limits are submitted by the facility on a monthly basis. These reports are reviewed when received and have demonstrated compliance.

II. Material Limit

NA

III. Process/Operational Restrictions

Fuel used for emergency flare pilot is sweet natural gas only.

Signals are present for continuous in-shed monitoring of hydrogen sulfide.

Facility has not been in operation since August 2017. Therefore, the operation restrictions were not evaluated for the review period of December 2018 – January 2019

IV. Design/Equipment Parameters

The incinerator is equipped with oxygen and combustor temperature monitoring equipment. The operating setpoints for oxygen and combustor temperature meet/exceeds the requirement.

V. Testing/Sampling

Facility has not operated during the inspection/review period.

VI. Monitoring/Recordkeeping

Facility has not operated during the inspection/review period. These records would be included with monthly reports during operation.

VII. Reporting

- 1., 2., 3., ROP deviation, semiannual and annual reporting. All reports have been submitted in a timely manner and with proper certification. Reports were reviewed as they were received.
- 4., 5., Facility has not operated during the inspection/review period.

VIII. Stack/Vent Restrictions

SVINCINERATOR exhaust dimensions and stack height appeared to meet the requirements of the ROP at time of inspection.

IX. Other Requirements

Fencing, warning signs, and other measures necessary to prevent unauthorized individuals from entering the plant property were adequate.

Facility did not operate during the inspection/review period.

EUGLYCOLDEHYDRAT

Facility did not operate during the inspection/review period. Therefore, process/operational restrictions were not evaluated at this time.

This emission unit is included in the ROP and is subject to the requirements of 40 CFR Part 63, Subpart HH. The State of Michigan has not taken delegation of authority of this regulation for area sources. Therefore, compliance analysis of EUGLYCOLDEHYDRAT was not conducted.

EUNATGASENGINE

This emission unit is included in the ROP and is subject to the requirements of 40 CFR Part 63, Subpart ZZZZ. The State of Michigan has not taken delegation of authority of this regulation for area sources. Therefore, compliance analysis of EUNATGASENGINE was not conducted.