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Ingham

DEPARTMENT OF ENVIRONMENTAL QUALITY
AIR QUALITY DIVISION

FCE Summary Report

Facility : Michigan State University	SRN : K3249
Location : 426 Auditorium Rd. Board of Trustees Room 405	District : Lansing
	County : INGHAM
City : EAST LANSING State: MI Zip Code : 48824	Compliance Status : Compliance
Source Class : MAJOR	Staff : Daniel McGeen
FCE Begin Date : 3/22/2018	FCE Completion Date : 9/27/2019
Comments :	

List of Partial Compliance Evaluations :

Activity Date	Activity Type	Compliance Status	Comments
09/24/2019	Other Non ROP	Compliance	Annual digester engine report for EU-DIENGINE confirms 100% of the fuel to digester engine was digester gas, the engine operated within limits, and there were no malfunctions with the meters.
09/11/2019	Other Non ROP	Compliance	MSU's Mr. Tom Grover emailed NSPS information for the 3 RICE units to be installed at the TB Simon Power Plant under PTI No. 139-18.
09/06/2019	Other Non ROP	Compliance	MSU submitted notification that site excavation activity began for RICE units under PTI No. 139-18 on 8/6/2019. Electronic copy received 9/4/2019, hard copy received 9/5. Site activity was expected to continue for 17-18 months. MSU expects to forward NSPS RICE information by 9/11/2019.
08/30/2019	ROP SEMI 2 CERT	Compliance	Report for second half of 2018. Unit 3 had NOx monitor downtime to QA and known and unknown causes. Sample pump was replaced and analyzer calibrated. Unit 4 had NOx monitor downtime due to QA. FG-UNIT5/6 had NOx and CO monitor downtime due to malfunction, reported working with the PEMS vendor to correct.

Activity Date	Activity Type	Compliance Status	Comments
08/30/2019	Excess Emissions (CEM)	Compliance	Report received timely and complete for Unit 3, 4, 6 EERs for 2nd Quarter 2019. Unit 3 NOx monitor had 0 downtime and no excess emission events, but one missing record. Unit 4 NOx monitor had 0 downtime, and no excess emissions. Unit 6 NOx monitor had 0 downtime and no excess emissions. Unit 6 CO monitor had no excess emissions. All units had operating hours reported. Linearity tests passed, and one Pass APS.
08/30/2019	ROP Semi 1 Cert	Compliance	ROP Semi-annual Certification for Section 1 received timely and complete. No deviations were reported.
08/30/2019	Excess Emissions (CEM)	Compliance	Excess emissions (CEM) report for 1st Quarter 2019 received timely and complete. Unit 3 NOx monitor had 0 downtime and 0 excess emissions. Unit 4 NOx monitor had 0 downtime and 0 excess emissions. Unit 6 NOx monitor had 0 downtime and 0 excess emissions. Unit 6 CO monitor had 0 excess emissions. All units had operating hours reported.
08/30/2019	ROP Annual Cert	Compliance	Report submitted covering all of 2018; Deviation report identified as annual report type, although the annual box was not checked on ROP certification form, only semi-annual. This appears as if it may be an oversight, as data was provided for all 2018. Monitoring downtime due to QA and malfunction and other known causes.
08/30/2019	ROP Semi 1 Cert	Compliance	ROP SEMI 1 CERT for Section 2 received timely and complete. No deviations were reported.
08/01/2019	Stack Test	Compliance	Stack test plan received on 8/1/2019 by LDO and by TPU via e-mail for digester gas-fired RICE at South Dairy Farm. Testing of CO, NOx, and VOC is required pursuant to 40 CFR Part 60, Subpart JJJJ, every 8,760 hours of operation or every 3 years, whichever comes first. LDO to attend proposed testing on 10/4/2019. Test is pending, but past tests have indicated compliance.

Activity Date	Activity Type	Compliance Status	Comments
07/29/2019	Malfunction Abatement Plan	Compliance	Reviewing MAP for EU-ETO2 which is dated 10/2017. I had not been able to locate it in AQD files, so MSU's Mary Lindsey provided a copy on 7/26/2019. Reviewing it is progressing on 7/29/2019.
06/11/2019	MAERS	Compliance	*Electronic* 2018 MAERS received 3/15/2019, but without certification. I contacted MSU, and certification was received on 3/26/2019. Check MAERS for any review comments. Emissions changes overall correspond with material throughput increases or decreases. Report passes audit.
03/22/2019	Scheduled Inspection	Compliance	Partial Compliance Evaluation activities, part of a Full Compliance Evaluation: Day 1 (3/22/2019) of MSU inspection: Section 1, Campus and former MBI, Day 2 (3/28/2019) of MSU inspection, TB Simon Power Plant, and Day 3 (7/24/2019) of MSU inspection: Campus and former MBI.
03/19/2019	Excess Emissions (CEM)	Compliance	Excess emissions Unit 3, 4, 6 for 1/1-3/31/2018. TPU has previously reviewed this report, and indicated compliance..
03/19/2019	Excess Emissions (CEM)	Compliance	Unit no. 3, 4, 6 EER report for 4/1-6/30/2018. Downtime events Unit 3 NOx#/MM monitor due to variety of causes, no excess emissions. Downtime events Unit 4 NOx#60 (NOx lbs/hr - Part 60) monitor downtime to known causes and 1 hr of unknown causes, no excess emissions; NOx#MM monitor downtime to known causes and 1 hr of unknown causes, no excess emissions. Unit 6 CO tons/hr monitor: no downtime; NOx tons/hr monitor: no downtime; Unit 6 CO TPY: no excess emissions. Unit 6 NOx TPY: no excess emissions.

Activity Date	Activity Type	Compliance Status	Comments
03/19/2019	ROP Semi 1 Cert	Compliance	Semi-annual cert. for 1/1-6/30/2018, Section 2, indicated 7 deviations: Unit 3 NOx monitor downtime due to QA, CEMS database migrated to new server, and to unknown causes (problems reported addressed according to QA/QC plan); Unit 4 NOx monitor downtime due to monitor equipment malfunction, due to quarterly linearity (QA), and CEMS database being migrated to new server, and unknown causes (problems reported addressed according to QA/QC plan).
03/19/2019	ROP Annual Cert	Compliance	ROP Annual Certification for Section 1 for 1/1-12/31/2018. No deviations were reported. Electronic version received 2/12/2019.
03/19/2019	Excess Emissions (CEM)	Compliance	Unit 3, 4, 6 EERs for 7/1-9/30/2018. No excess emission events.
03/12/2019	ROP Semi 1 Cert	Compliance	ROP Semi-annual Certification for Section 1 for 7/1-12/31/2018. No deviations were reported.
03/12/2019	ROP SEMI 2 CERT	Compliance	Semi-annual deviation Report for ROP section 2 for 7/1-12/31/2018. Semi-annual had 7 deviations; one of which was Unit 3 NOx high monitor downtime (89 hrs), due to QA and known causes, including low chamber pressure and sample pump failing. TPU has previously reviewed this report and indicated compliance.
03/11/2019	Telephone Notes	Compliance	Discussion of institutional laundromat at MSU, and if any VOC-containing towels are washed, regarding AQD laundromat inspection initiative. MSU properly disposes of towels containing oil, grease, or solvents, instead of washing them, I was advised.
11/01/2018	Stack Test	Compliance	Stack test results for 9/20/2018 test of EU-DIENGINE at South Campus Dairy Farm, for digester gas-fired generator. Testing for the SI-RICE is required by 40 CFR Part 60, Subpart JJJJ, and by MI-ROP-K3249-2016a. The test results were within the required limits for CO, NOx, and VOC.

Activity Date	Activity Type	Compliance Status	Comments
09/20/2018	Stack Test Observation	Compliance	Stack test of EU-DIENGINE at the MSU Dairy Farm, pursuant to 40 CFR Part 60, Subpart JJJJ. Onsite data showed compliance.
08/27/2018	Stack Test	Compliance	Stack test protocol for EU-DIENGINE at South Campus Dairy Farm received 8/14/2018 for digester gas-fired generator. Testing for the SI-RICE is required by 40 CFR Part 60, Subpart JJJJ, and by MI-ROP-K3249-2016a. This test is said to be within 8.760 operating hours of the 9/21/2017 test of this unit. NOx, CO, and VOC will be tested. Plan is for unit to be tested within 10% of max rated 380 kW at rated engine power output of 510 BHP. Facility will record engine run hours at beginning of test 1, engine serial number, generator kW output. 8/23/2018 letter from AQD's T. Gasloli specifies process data to be recorded by facility.
05/31/2018	MAERS	Compliance	Received timely and complete. AQD DS B. Myott advanced the audit to completion, based on overall quality of the data, and the source's familiarity with reporting to MAERS.

Name:



Date:

9/30/2019

Supervisor:



