# DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION

**ACTIVITY REPORT: Scheduled Inspection** 

FACILITY: Ottawa County Farms Landfill		SRN / ID: N3294	
LOCATION: 15550 68th Avenue, COOPERSVILLE		DISTRICT: Grand Rapids	
CITY: COOPERSVILLE		COUNTY: OTTAWA	
CONTACT: Rob Carr , Site Manager		ACTIVITY DATE: 08/30/2018	
STAFF: David Morgan	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MAJOR	
SUBJECT:			
RESOLVED COMPLAINTS:			

At 9:15 A.M. on August 30, 2018, Air Quality Division (AQD) staff Dave Morgan conducted a scheduled inspection of the Ottawa County Farms Landfill (OCFL) located at 15550 68th Avenue in Coopersville. The purpose of the inspection was to determine the facility's compliance with Renewable Operating Permit No. MI-ROP-N3294-2013 and state and federal air pollution regulations. Accompanying AQD staff on the inspection of the OCFL was Rob Carr, Site Manager.

#### **FACILITY INFO**

The OCFL is a municipal solid waste landfill, with a design capacity of 13.0 million cubic meters. Since the stationary source was modified after July 17, 2014 and has a design capacity greater than 2.5 million cubic meters, it is subject to the New Source Performance Standard (NSPS) for Municipal Solid Waste Landfills promulgated in 40 CFR Part 60, Subparts A and XXX. The stationary source is also subject to the National Emission Standard for Hazardous Air Pollutants (NESHAP) for Municipal Solid Waste Landfills promulgated in 40 CFR Part 63, Subparts A and AAAA. It is noted that the requirements under 40 CFR Part 60, Subpart WWW also apply to the stationary source because 40 CFR Part 63, Subpart AAAA adopts Subpart WWW requirements by reference.

Because the NMOC emissions are greater than 34 megagrams per year, the company is required to install a landfill gas collection and control system (GCCS). Currently gas from closed and active portions of the landfill are collected by an active gas collection system and directed to Energy Developments Coopersville LLC (EDC) where internal combustion engines burn the landfill gas to produce electricity. Excess gas is used by Resource Recovery Corporation (RRC) to recover metal and sand from used foundry sand. The OCFL and EDC are considered one stationary source, despite having two separate ROPs. RRC is not considered part of the stationary source.

Currently OCFL is subject to ROP No. MI-ROP-N3294-2013, however OCFL and EDC will be combined into one ROP upon renewal due to an AQD policy change.

#### **COMPLIANCE EVALUATION**

# (EULANDFILL & EUALGCS/FGLGCS):

As stated, the landfill has an active GCCS on both closed and interim cover areas that was installed as required under Subpart WWW requirements. Since Subpart XXX is now applicable, the company has to meet the following schedule for a GCCS under Subpart XXX:

<u>Milestone</u>	<u>Date</u>
Expansion Permit Issued:	10/7/2016
Commencement of Construction:	7/15/2017
Initial Design Capacity and NMOC Emission Rate Report Submitted	10/9/2017
GCCS Design Plan Due:	10/9/2018
GCCS Installation Date Due:	4/9/2020 (30 months from NMOC emission rate report)

Although the GCCS requirements under Subpart XXX do not apply until 4/9/2020, the GCCS requirements of Subpart WWW still apply to the source. Subpart WWW and the ROP require that each interior wellhead be operated with a landfill gas temperature less than 131°F, a nitrogen level less than 20% or oxygen (O2) level less than 5%, and negative pressure. If a well exceeds one of these operating parameters, action is to be initiated to correct the exceedance within 5 calendar days. If the exceedance is not corrected within 15 calendar days of the first measured exceedance, then the gas collection system is to be expanded within 120 days of the initial exceedance to correct the problem or alternate compliance timeline requested. OCFL uses SCS Field Services to

conduct well monitoring/tuning and well maintenance on a monthly basis as required by Subpart WWW and the ROP. At a minimum, the vacuum pressure, O2 concentration and temperature at each wellhead is monitored and recorded. It is noted that during the inspection an SCS Field Services technician was on site to conduct well maintenance.

According to company records from September 2017 to August 2018 wells 2A, 17R, 44A, 49A, 83R, H01, E15R, EW01, EW14, EW29, and EW128 had O2 exceedances that occurred beyond the 15 day re-monitoring period. For the same time period, wells 57A, PW25, H01, EW02, EW22, EW35R, EW43, and EW52R had positive pressure that occurred beyond the 15 day re-monitoring period. All of these wells were approved for an alternate compliance timeline by either redrilling, replacing lateral lines, maintaining pumps or abandonment. AQD staff observed the location of many of these wells while on site. Monthly well monitoring records are attached.

The surface concentration of methane is monitored on a quarterly basis in accordance with Subpart WWW and the ROP. During the past four quarterly surface monitoring reports over 2017 and 2018, no methane concentrations were detected above 500 ppm. A copy of the results are attached. According to company records, all calibration was conducted prior to each surface monitoring event in accordance with Subpart WWW and the ROP.

Records pertaining to maximum design capacity, year-to-year acceptance rate, and amount of waste in place are maintained on site in accordance with Subpart WWW. As of September 2017 there was 34,700,557 cubic yards of capacity remaining of the total permitted capacity of 56,975,000 cubic yards. In addition a GCCS design plan was submitted in accordance with Subpart WWW for the expansion. A new design plan will be submitted to meet the Subpart XXX requirements.

#### Enclosed Flare (EUENCLSDFLARE):

In 2008 a 3,700 scfm enclosed flare was installed to ensure that the landfill maintains compliance with the control requirements of the NSPS should EDC shutdown. The flare is only used as backup, but the enclosed flare is operated roughly twice per month for the OCFL. Each time the enclosed flare is fired-up, a startup report is created.

An initial performance test was conducted in November 2009 to verify the reduction efficiency for NMOC in accordance with applicable permit and NSPS requirements.

The company is keeping records of the 12-month rolling carbon monoxide (CO) emission rate, the landfill gas usage rate and the average Btu content of the landfill gas burned. According to company records for the period from August 2017 through July 2018, the CO emission rate was 0.17 tons (which is below the 97.3 ton permit limit), the total landfill gas burned was 3.0 million cubic feet. Records are attached. The equipment has a flow device which monitors gas flow as well as a heat sensing device to monitor the presence of the flame when it is operated.

# Asbestos Waste (EUASBESTOS):

OCFL continues to accept asbestos containing waste which is placed in designated locations within the landfill. The asbestos waste is placed in columns to eliminate the need to disturb those areas. The company also surveys the asbestos waste in the landfill for each lift of asbestos waste to get the best dimensional picture of the waste location. AQD staff reviewed survey records while on site; no issues were identified. During the inspection, staff observed the current asbestos disposal location which was clearly marked with at least three upright, visible signs that were larger than 20 inches by 14 inches. Cover material had been placed over the asbestos disposal area; no visible emissions were observed. It is noted that the landfill has both natural barriers and fencing that deters access to the site by the general public; signage and site barriers were appropriate.

The landfill maintains all required asbestos shipment records, which were reviewed on-site, in accordance with the ROP. According to company records, from August 2017 through August 2018, there were 2,493 cubic yards of friable asbestos accepted at the site.

## Cold Cleaner (EUCOLDCLEANER):

No non-compliance issues have been identified.

## Start-up, Shutdown, Malfunction:

The company maintains a start-up, shutdown, malfunction plan in accordance with 40 CFR Part 63, Subpart AAAA for Municipal Solid Waste Landfills. AQD staff reviewed records implemented as a result of the plan.

#### Miscellaneous:

There were no odors verified off site.

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The Ottawa County Farms Landfill appears to be in compliance with all applicable requirements. Records are attached.

NAME DATE 9/13/18 SUPERVISOR

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