DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION

ACTIVITY REPORT: Scheduled Inspection

NZ15344710		
FACILITY: Sleepy Hollow Pet Cemetery LLC		SRN / ID: N2153
LOCATION: 2755 64th Street SW, BYRON CENTER		DISTRICT: Grand Rapids
CITY: BYRON CENTER		COUNTY: KENT
CONTACT: Joel Fields, General Manager		ACTIVITY DATE: 06/04/2018
STAFF: Tyler Salamasick	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MINOR
SUBJECT: Minor source inspect	ion FY 2018	
RESOLVED COMPLAINTS:		/

Background

Sleepy Hollow Pet Cemetery LLC (Sleepy Hollow), SRN N2153 is a crematorium that specializes in pet cremations. The facility is located at 2755 64th Street SW, Byron Center, Michigan. Sleepy Hollow is located in a primarily residential area with the nearest residential structure approximately 230 feet east of the facility. The facility was inspected on 6/4/2018 by Tyler Salamasick, Environmental Quality Analyst of the Michigan Department of Environmental Quality, Air Quality Division. The purpose of the inspection was to determine the facility's compliance with the requirements of the federal Clean Air Act; Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451); the Air Pollution Control Rules; and the facility's permits PTI No. 253-01, 116-04, 149-13 and 148-17. The permits cover four different incinerators each equipped with secondary chamber afterburners. The main pollutant restricted by the permits is particulate matter (PM). PM is a criteria pollutant which is regulated by the Clean Air Act (CAA).

A previous inspection indicated that the facility had uninstalled equipment permitted by PTI No. 116-04. It was recommended that the facility submit a request to the MDEQ Permit Section and the Grand Rapids District office. The permit has not yet been voided.

Inspection

Site arrival was at 1:07 pm on June 4, 2018. I drove around the area and made observation of the facility's stacks. I did not observe opacity. I could tell that the ovens were being used because I detected the heat distortion at the top of the stack. I did not observe odors other that normal ambient air around the facility. After making my observations, I arrived on site and meet with Joel Fields, General Manager I presented my State of Michigan identification card, informed the facility representative of the intent of my inspection and was permitted onto the site. Joel contacted the business owner, David Fields and then agreed to show me the facility and their processes.

Process

The facility operates three cremation ovens, EUINCINERATOR4, EUINCINERATOR3 and EUINCINERATOR. The equipment is equipped with a secondary burn off chamber. The secondary burn off chamber has a continuous temperature monitor that records the temperature on a circle chart. The secondary burn off oven is required to be maintained at a minimum of 1600F while the primary chamber is being operated. This is a design and operation requirement that is used in order to ensure proper combustion of secondary particulate matter (PM). The secondary burn off acts as the device's emissions control for PM.

While walking through the facility I noted that the area was exceptionally clean. Joel showed me how they kept loading records and temperature chart records. He also showed me the storage freezer which had a thermometer indicating that it was maintained at 0F. After walking through the facility, I asked for Joel to collect the records, so I could review them on site.

Record review

Each of the permits (PTI 149-13, PTI 253-01 and PTI 147-17) requires that the permittee maintains a continuous temperature record of the secondary after burner. I review the records and they appeared sufficiently record the temperature. I did observe some charts with some ink blotting that made the charts difficult to read. Joel indicated that he was testing different things to prevent this from happening. For the most part, the ink blots only occurred when the temperature lowered, and the ovens were not being used, so it did not drastically impact the data. I asked for a few different samples from each oven and Joel later emailed me a scanned copy. The permit also requires that the facility maintains records of when incinerators are used. I review the facility's record keeping and it appeared to properly record the facility's usage.

PTI 149-13, PTI 253-01 and PTI 147-17 compliance evaluation

Each of the incinerators are covered by different permits but have similar requirements.

Emission Limits

Each of the permits limit the PM emissions of each incinerator to 0.20 lb/1,000 lbs of gas. The permit bases this limit off of the presumption that the after burner is operated correctly. The MDEQ reserves the ability to require the facility to test the equipment under general condition 13. The MDEQ is not requesting the facility test the equipment at this time. Instead this condition is presumed to be met by evaluation the operational conditions referred to later in this report.

Material limits

The permits require that the permittee shall not burn any waste in EUINCINERATOR4, EUINCINERATOR3 and EUINCINERATOR other than the following: (40 CFR 60.51c) Pathological wastes—As defined in the federal Standards of Performance for New Stationary Sources, 40 CFR 60.51c, pathological waste means waste materials consisting of only human or animal remains, anatomical parts, and/or tissue; the bags/containers used to collect and transport the waste material; and animal bedding. This emission unit shall burn only animal pathological waste and associated materials. At the time of my inspection I did not observe any waste on site that did not meet these criteria. Joel also informed me that they only cremate pet remains.

PTI 148-17 and PTI 149-13 also limit the total material through put to a maximum of 1000 lbs and 2500 lbs, respectively. The facility's records indicated that they were below the weight restrictions. The facility bases the weights of the veterinarian's last weight record. The highest weight Joel indicated was for the PTI 148-17 incinerator, which they have used for horses, weighing as much as 1300 lbs.

Process and Operational Restrictions

The process and operational restrictions of the permits requires that the facility maintain a minimum temperature of 1600°F and a minimum retention time of 1.0 second in the secondary combustion chamber are maintained for each of the incinerators. I observed the temperature charts as well as a digital read out as the incinerators were operating. At the time of my inspection EUINCINERATOR was in preheat mode and the oven was at 1550F and heating to 1650F. INCINERATOR3 had the secondary afterburner temperature at 1647F. The digital reading was consistent with the paper chart (hard copy). INCINERATOR4 had the secondary afterburner at 1674F which was also consistent with the paper chart.

The permits also require that the facility follow an incinerator operator maintenance guideline as

detailed in the appendix. This requires various different practices common to proper operation of the incinerators. This included preheating the units for at least 15 minutes before loading, which Joel indicated that they did. It also requires that the staff observe the stack frequently in order to adjust operations to prevent smoke and ash. The facility maintains a camera that broadcasts live stream to the TV in the office as well as Joel's phone. This was exceptionally impressive and appears to be a very responsible approach to frequent monitoring of the stack

Conclusion

It appears that Sleepy Hollow Pet Cemetery is in compliance with the requirements of the federal Clean Air Act; Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451); the Air Pollution Control Rules; and PTIs No. 253-01, No. 149-13 and No. 148-17. The permit (PTI No.116-04) will need to be voided since the equipment is no longer on site. AOD staff will recommend that the facility have the permit voided.

NAME.

DATE

SUPERVISOR