

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

N714743788

FACILITY: DeWitt Barrels, Inc		SRN / ID: N7147
LOCATION: 1125 Comstock Street, MARNE		DISTRICT: Grand Rapids
CITY: MARNE		COUNTY: OTTAWA
CONTACT:		ACTIVITY DATE: 01/11/2018
STAFF: Tyler Salamasick	COMPLIANCE STATUS: Compliance	SOURCE CLASS: SM OPT OUT
SUBJECT: Opt out source inspection fy 2018		
RESOLVED COMPLAINTS:		

Background

Dewitt Barrels SRN: N7147 is barrel recycling facility that specializes in washing and reconditioning used chemical barrels, totes and drums. The production facility is located at 1125 Comstock Street, Marne, Michigan 49435. Dewitt Barrels is located in a small industrial area surrounded by agricultural and residential areas. The nearest residential structure is located approximately 850 feet ESE of the facility. The facility was inspected on 1/11/2018 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 PTI No. 134-02D. Dewitt Barrels is an Opt-Out Source for hazardous air pollutants (HAPs). PTI 134-02D limits the facility to 9.0 tons per year of each individual HAP and 22.5 tons per year of aggregate (total) HAPs. The permit also limits the emission of volatile organic compounds (VOCs) from the facility's barrel coating line.

Inspection

I originally intended to inspect Dewitt Barrels unannounced on 1/5/2018. I arrived at approximately 2:00 PM and it was apparent that the facility was shutting down for the day. I spoke with Mike Vanderm, Eric Hall and Jason Dewitt. I informed them of the intent of my inspection and provided my State of Michigan identification card. They informed me that they were done operating for the day but that I was welcome to inspect the facility. I informed them that I would return to see the facility when the equipment was being operated. During our conversation Jason also informed me that they would be disconnecting power from the painting equipment (PTI 134-02D). I informed Jason that I would like to return after the equipment has been disconnected in order to verify that it is not operable.

I returned to Dewitt Barrels on 1/11/2018 to inspect the facility. Jason Dewitt showed me the facility, informed me of their processes and provided me with records. Dewitt Barrels normally operates from 6:00 AM until 2:30 PM on Monday through Friday. The facility currently employs approximately 20 people. Jason informed me that the facility used to employ between 100 to 60 people approximately 4 years ago. The facility has recently been acquired by Meyer Industrial East. As a result, Dewitt Barrels has been in the process of reorganizing their operations. Jason informed me that they might completely remove the coating operations. At this time the equipment will remain on site with the potential to restart at a later a date.

After our discussion, Jason and I walked through the facility. Upon entering the main operations area, I observed strong chemical and cleaning odors. I asked to see the process from start to finish. The process begins at the barrel receiving area. Until recently Dewitt Barrels has been receiving large plastic totes, plastic barrels and steel drums. Jason informed me that though they have steel drums on site, they do not intend to receive additional drums as they transition to only barrels and totes.

When the containers are received, workers sort the barrels based on content labels. Workers visually inspect the containers for defects and excess content. Jason informed me that they receive Resource Conservation and Recovery Act (RCRA) empty barrels and will reject any barrels that are not empty. RCRA 40 CFR § 261.10 defines empty barrels as...

(b)(1) A container or an inner liner removed from a container that has held any hazardous waste, except a waste that is a compressed gas or that is identified as an acute hazardous waste listed in §§ 261.31 or 261.33(e) of this chapter is empty if:

(i) All wastes have been removed that can be removed using the practices commonly employed to remove materials from that type of container, e.g., pouring, pumping, and aspirating, and

(ii) No more than 2.5 centimeters (one inch) of residue remain on the bottom of the container or inner liner, or

(iii)(A) No more than 3 percent by weight of the total capacity of the container remains in the container or inner liner if the container is less than or equal to 119 gallons in size; or (B) No more than 0.3 percent by weight of the total capacity of the container remains in the container or inner liner if the container is greater than 119 gallons in size.

(2) A container that has held a hazardous waste that is a compressed gas is empty when the pressure in the container approaches atmospheric.

(3) A container or an inner liner removed from a container that has held an acute hazardous waste listed in §§ 261.31 or 261.33(e) is empty if:

(i) The container or inner liner has been triple rinsed using a solvent capable of removing the commercial chemical product or manufacturing chemical intermediate;

(ii) The container or inner liner has been cleaned by another method that has been shown in the scientific literature, or by tests conducted by the generator, to achieve equivalent removal; or

(iii) In the case of a container, the inner liner that prevented contact of the commercial chemical product or manufacturing chemical intermediate with the container, has been removed.

The workers sort the drums, barrels and totes into different areas. I first inspected the steel drum staging area. The facility still has the drum washing equipment operational, though it was not in operation at the time of my inspection. Jason told me that they may consider converting the equipment to be capable of washing the plastic barrels. This process uses a caustic (NaOH) solution to clean the inside of the containers. The process used to involve washing the steel drums and preparing them to be coated. Jason showed me the coating booth. The equipment was not running. Jason informed me that the equipment no longer had power running to it. The equipment was shut down and empty barrels were stored around it. I also observed the curing oven associated with the coating process. The oven was also not operating. It appeared that they were storing additional barrels inside the oven and along the sides of it.

After observing the coating area, we went to the tote washing area. The process consisted of a large washing area with a drying area. The workers loaded the totes onto a staging area. They used a wash solution of warm water and orange solvent cleaning solution. While in the area, I observed strong citrus odors and miscellaneous chemical odors. Jason provided me with the SDS of the Citrus C-20 cleaning solution. The material consists of less than 10% 2-butoxyethanol and a proprietary blend of less than 10% orange terpenes. 2-butoxyethanol was removed from the 40 CFR Part 63 list of Hazardous Air Pollutants (HAPs) in 2004. The material is 4-8% VOC by weight. Dewitt previously demonstrated that if the facility uses less than 5 totes per month the emissions from the cleaning agent would be exempt from permitting pursuant to Rule 290. The facility's records indicated that for the year of 2017 the highest monthly emission was 564.91 lbs of VOCs. This is below the 1000 lb monthly VOC emission limit of Rule 290.

The current Rule 290 exemption demonstration did not account for emissions of residual contents of the totes and barrels. If the materials in the dirty drums contain VOCs it is likely that they would be emitted as fugitive air contaminants. I asked Dewitt Barrels to provide a demonstration of what air contaminants would be emitted from the residual materials. During the information gathering process I spoke with Kim Miller the Environmental Director at Industrial Container Services (Dewitt Barrels parent company). Kim provided an exemption demonstration on 3/21/2018. She did inform me that the majority of the materials cleaned (estimated at 95%) were not solvent based. The demonstration indicated that drum and tote washing emissions met the requirements of R 336.1290(a)(ii). The projected monthly emissions were 39.44 lbs of VOC per month. This is below the 1000 lb per month limit of Rule 290.

Kim confirmed that they would no longer be conducting painting operations at Dewitt Barrels. She indicated that they would request to void the permit. The emissions from the booths were not evaluated since the facility will no longer be operating the booths. I was also unable to evaluate operational restrictions because the booths had been disconnected and were not operable during the time of my inspection.

Conclusion

It appears that Dewitt Barrels 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 PTI No.134-02D. The facility's permit will be voided upon request from the facility representatives.

NAME 

DATE

3/26/18

SUPERVISOR 