

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

A239950932

FACILITY: HELEN INC DBA ENVIRONMENTAL COATINGS		SRN / ID: A2399
LOCATION: 6450 HANNA LAKE RD, CALEDONIA		DISTRICT: Grand Rapids
CITY: CALEDONIA		COUNTY: KENT
CONTACT: John Young, Environmental Manager		ACTIVITY DATE: 10/10/2019
STAFF: April Lazzaro	COMPLIANCE STATUS: Compliance	SOURCE CLASS: Minor
SUBJECT: Unannounced, scheduled inspection.		
RESOLVED COMPLAINTS:		

Staff, April Lazzaro arrived at the facility and met with John Young, Senior Technician/Environmental Coordinator. Mr. Young has been with the company for ~20 years and was able to provide all pertinent information necessary for determining compliance. A very slight solvent odor was noted directly outside the facility; there have been no odor complaints.

FACILITY DESCRIPTION

Helen Inc. d/b/a Environmental Coatings Inc. is an industrial coating manufacturing facility.

Current products being manufactured here includes lacquer, high solids paints, water-based coatings and enamels as well as specialty small batch coatings of various kinds. Mr. Young indicated that there has been no new equipment added since the last AQD inspection which was in 2013. Currently, the facility operates pursuant to Permit to Install (PTI) No. 795-88A for the paint manufacturing process and PTI No. 797-90 for the paint tote cleaning booth. Mr. Young stated that the facility has never manufactured any Teflon coatings nor used any ingredients containing perfluorooctanoic acid (PFOA) and/or perfluorooctane sulfonic acid (PFOS). Additionally, I learned that the four underground solvent storage tanks had been removed more than 20 years ago.

COMPLIANCE EVALUATION

795-88A

The equipment covered by this permit includes 21 mixing tanks, 8 dispersers, 4 shot mills, 2 ball mills, test paint booths and a small boiler. This equipment is housed in various areas, referred to internally as "Plants", and were visually observed during the inspection. Much of the equipment was not in operation at the time of the inspection as a lot of the units are job specific, and one type of coating is manufactured in each as needed. There are only two specific stacks identified in the permit. The plant ventilation systems serves the tanks, which is comprised of large air handling unit(s) that ensures air turnover in the facility. When moving from area to area, it was obvious that the facility is under negative pressure.

Mr. Young maintains the emissions spreadsheet daily, which was evident by the fact that emissions records were complete through October 8, 2019. (see attached) The permit limits emissions of volatile organic compound (VOC) to 8.9 pounds per hour (lb/hr) and 8.7 tons per year (tpy). For the year 2019, the maximum reported hourly VOC emissions was 2.29 lb/hr. Year to date VOC emissions are 0.47 tons.

The 2017 total VOC emissions were 0.716 tons and the 2018 VOC emissions were 0.766 tons. These values indicate compliance with the permit limit.

The permit also limits the total gallons of paint produced to 800,000 gallons per year. The total paint produced in 2017 was 183,231 gallons and in 2018 the facility produced 197,874 gallons. These values indicate compliance with the permit.

A very small can filling line is also present, with limited emissions beyond the manufacturing process.

During our compliance discussions, I learned that there have been some minor changes in coating compositions over the years. Specifically, the facility does not use any lead, cadmium or other heavy metals in the coatings. Additionally, no hexavalent chromium is used in the formulation of any of their paints. Over the years, Mr. Young has provided potential-to-emit calculations for VOC and hazardous air pollutants (HAP) and was able to demonstrate the true minor status of the facility. Since there have been no equipment changes and coatings have moved further toward a lower VOC content, this status appears to remain the same.

797-90

The equipment covered by this permit consists of spray nozzles inside a booth where an employee will spray solvent to clean leftover paint and/or resins out of a tote. The solvent and other residue is put into a holding tank for later reclamation by a licensed disposal company. The solvent used in this process is still the SC 100 that has always been used.

The VOC emissions from the cleaning booth are limited to 8.9 lb/hr and 8.7 tpy. A review of the recordkeeping provided showed that Mr. Young is keeping track of both VOC and HAP emissions from this booth. During 2019, the highest reported VOC emissions were 1.71 lb/hr and 0.15 tons per month, with year to date VOC emissions of 0.29 tons. This is below the 8.7 tons per year allowed.

This coating manufacturing facility has been in operation for a long time and AQD files go back nearly 40 years. As such there are areas with significant accumulation of materials. In some areas, it was not clear whether it was historical material accumulation or recent. Mr. Young was educated and aware of the waste material storage and labeling requirements, as well as the holding times for any waste materials.

Following the physical inspection, Mr. Young and I went to his office so he could access and print out the compliance recordkeeping. This recordkeeping is in a historical format and utilizes the emission factors established during permitting, which is acceptable. The emissions recordkeeping is attached to this report.

COMPLIANCE SUMMARY

Helen, Inc, d/b/a Environmental Coatings, Inc. was in compliance at the time of the inspection.

NAME



DATE

10-11-19

SUPERVISOR

