

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

N603838854

FACILITY: SHAWMUT CORPORATION		SRN / ID: N6038
LOCATION: 2770 DOVE ST, PORT HURON		DISTRICT: Southeast Michigan
CITY: PORT HURON		COUNTY: SAINT CLAIR
CONTACT: Eric Finn , Plant Manager		ACTIVITY DATE: 02/28/2017
STAFF: Sebastian Kallumkal	COMPLIANCE STATUS: Compliance	SOURCE CLASS: SM OPT OUT
SUBJECT: Onsite Inspection		
RESOLVED COMPLAINTS:		

On Tuesday, February 28, 2017, Michigan Department of Environmental Quality-Air Quality Division staff Sebastian Kallumkal conducted an unannounced "scheduled" inspection of Shawmut Corporation (N6038), located at 2770 Dove Street, Port Huron, Michigan. The purpose of this inspection was to determine the facility's compliance with the Federal Clean Air Act Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act of 1994, PA 451, as amended, and PTI No. 502-96B.

I arrived at the Shawmut Corporation at about 2:00 PM and met with Mr. Eric Finn, Plant Manager, Mike Schwenter, Operations Manager, and Mr. Nick Bastianelli, Process Engineering Manager. During pre-inspection meeting, we discussed facility's PTI No. 502-96B, and processes at the facility. Shawmut Corporation manufactures soft interior textiles (headliners, door panels, body cloth) for the automotive industry. The facility currently operates three shifts and has about 130 employees.

PTI No. 502-96B was issued for three natural gas fired flame laminators (EU00001, EU00002 and EU00003). Flame Lamination is a process used to produce laminates by bonding foam to fabric or foam to film or all three together by passing the foam over an open flame. Exposure to the flame creates a thin layer of molten polymer on the foam surface, which is then brought into contact with the secondary layer with a press to develop a bond between the two surfaces. EU00001 (Flame #1) and EU00003 (Flame #2) are the only two emission units currently in use. EU00002 (Flame #3) has been dismantled and removed.

Previous AQD contacts at the facility no longer work there. The new contacts did not know about the permit, so I provided them a copy of the permit and the application for their file. We discussed various requirements of the permit. They did not know how to locate the required records. I informed them that failure to keep records could be a violation of the permit conditions.

After the meeting, they accompanied me for an inspection of the facility. The employees were in the middle of shift change and getting the laminators ready for the next shift. They started both laminators. I observed that both fumes from both machines were vented to a hood which is exhausted to the atmosphere. Mr. Finn explained the process as follows:

EU00001 and EU00002 have the capability of producing 2-ply and 3-ply products. Foam rolls (manufactured elsewhere) are fed through the laminator. Each flame laminator has 2 burners which are turned on to exposed the foam to a flame to produce an adhesive side. As the foam exits the machine, fabric is rolled onto it and then pressed to develop a bond between the two surfaces. For 3-ply products this process occurs again on the other side of the foam.

The bonded product is then either rolled and shipped to customers or sent to the facility's cutting operation to produce blank parts. The facility has die presses to cut the laminated foam into different shapes. At the time of inspection, the cutting presses were not in use. The facility also has product inspection machines which are used in flagging the rolls or cutting the rolls into lengths specified by the customer. The die casting machines and inspection machines appear to be exempt from permitting pursuant to Rule 285(2)(I)(ii) and 285(2)(I)(vi)(B). The remainder of the building is used for storage of raw and finished products. Mr. Finn stated that the facility has no solvent cleaners, degreasers or emergency generators.

Later, Mr. Kevin Souza, Regulatory Compliance Manager, from the Corporate office in Massachusetts, informed me that he is keeping all the records required by the permit and the facility is submitting annual air pollutants emissions via Michigan Air Emissions Reporting System (MAERS). I printed the attachment for 2015 and 2016 MAERS reports. The attachments included monthly production records,

hours of operation per month, emission calculations for Particulate matter (PM) and Hydrochloric acid (HCl).

PTI No. 502-96B has emission limits for PM and PM10 for each laminator, PM-10 limit for FG-Laminators, facility wide HAP limits, and requirement to keep monthly hours of operation and annual hours of operations based on 12-month rolling for each laminator. The operation data for each laminator is digitally tracked. Mr. Souza double checks the material usage data with purchase/inventory records and then calculates emissions.

#### EU-00001, EU-00003 and FG-Laminators

SC 1.1a and 1.1b limits PM-10 and PM emissions to 5.6 pounds per hour and 0.1 lbs per 1000 lbs of exhaust gases calculated on a dry gas basis for EU-00001 and 4.5 pounds per hour and 0.1 lbs per 1000 lbs of exhaust gases calculated on a dry gas basis for EU-00003, respectively. AQD has not requested stack test to determine PM emissions. Facility calculates PM-10 emissions based formula provided in the PTI.

The facility reported emissions for EU-00001 and EU-00003. EU00001 had PM lb/hr values of 0.6, 0.7, 0.8, and 1.1 which are all below the permit limit of 5.6lbs/hr. EU00003 had PM lb/hr values of 0.5 and 0.6 which are all below the permit limit of 4.5 lbs/hr for 2015 and 2016.

The facility calculates the monthly PM-10 emissions. The PM10 yearly emissions for all Laminators (FG-Laminators) were approximately 13.84 tons in 2015 and 11.74 ton in 2016 which are below the FG-Laminators limit of 39.8 tpy.

#### FGFACILITY

The source wide HAPs for 2015 were approximately 2.18 tons (4369 lbs) and 1.84 tons (3685 pounds) for 2016 of HCL which are below the permit limit 9.9 tpy for single HAP. HCl is the only HAP reported by Shawmut Corporation. The other potential HAPs from the process are toluene diisocyanate (TDI) and hydrogen cyanide (HCN). Based on the the emission factors provided in the permit application, the emissions are well below single HAP emission limits and the aggregate HAP emissions. (See attached emission factors)

#### Conclusion:

Based on the information gathered during the inspection, Shawmut Corporation appears to be in compliance with the Federal Clean Air Act Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act of 1994, PA 451, as amended, and PTI No. 502-96B.

NAME Selean Kay Hallenkot

DATE 3/15/2017

SUPERVISOR

Joyce Bl