

**DEPARTMENT OF ENVIRONMENTAL QUALITY
AIR QUALITY DIVISION
ACTIVITY REPORT: Self Initiated Inspection**

A170249348

FACILITY: KASSOUNI MANUFACTURING INC		SRN / ID: A1702
LOCATION: 815 S FRONT ST, BELDING		DISTRICT: Grand Rapids
CITY: BELDING		COUNTY: IONIA
CONTACT: Tom O'Malley, Vice President		ACTIVITY DATE: 06/25/2019
STAFF: Kaitlyn DeVries	COMPLIANCE STATUS: Non Compliance	SOURCE CLASS: MINOR
SUBJECT: The purpose of this inspection was to determine compliance with PTI No. 364-07 and other applicable air quality rules and regulations. This inspection was in response to a fire incident at the facility on June 22, 2019 that generated a chlorine gas release.		
RESOLVED COMPLAINTS:		

On Tuesday June 25, 2019 Department of Environment, Great Lakes, and Energy (EGLE) Air Quality Division (AQD) staff Kaitlyn DeVries (KD) conducted an unannounced, self-initiated inspection of Kassouni Manufacturing Inc. (KMI) located at 815 South Front Street, Belding Michigan. The purpose of this inspection was to determine compliance with PTI No. 364-07 and other applicable air quality rules and regulations. This inspection was in response to a fire incident at the facility on June 22, 2019 that generated a chlorine gas release. The facility has had previous chlorine gas releases occurring in 2007, 2013, and 2016.

KD was accompanied by the following people during the inspection:

Dave Wierzbicki, EGLE, Remediation and Redevelopment Division - Incident Manager
Sgt. William S. Hoskins, Ionia County Emergency Management Coordinator
Det. Sgt. Jan Erlandson, DNR Office of Criminal Investigation
Chief Gregg Moore, Belding Fire Department
Deputy Chief Daryl Childs, Belding Fire Department
Lt. Orville Theaker, Michigan State Police Region 6 Coordinator
Jim Seibel, Ionia County Building Inspector
Tom O'Malley, Vice President of KMI.

Facility Description

The facility manufactures several different products including snow shovels, pool cleaning tablets, ice/snow melt tablets, and janitorial supplies. The facility is located between a residential area and the Flat River.

Regulatory Analysis

The facility is currently a minor source operating under PTI No. 364-07 and several other air use exemptions.

Compliance Evaluation

PTI No. 364-07

This permit is for the tablet press machines equipped with cyclone/baghouse dust collector systems exhausted to the general in-plant environment. Each of the presses are equipped with ductwork exhausting to a common baghouse collection system. Mr. O'Malley mentioned that the waste collected in the hoppers associated with the baghouses are returned to the system for re-use. At the time of the inspection, none of the tablet press machines were in operation and KMI staff was cleaning up the area.

The tablet press machines are used for the manufacturing of swimming pool tablets. The trichloroisocyanuric acid is stored in super sacks. The trichloroisocyanuric acid, in granular form, is combined with a boric acid binding agent to form the tablet.

KD asked about the size of the baghouse used for the tablet presses as well as the baghouse that is for the mixing process. Mr. O'Malley stated he would supply this information to KD, but he knew that they were cartridge type baghouses and they are changed approximately every six (6) weeks. The tablets are made at a rate of 30,000 pounds per day requiring the storage of approximately 350,000 pounds of trichloroisocyanuric acid to be stored on site. The acid is stored in supersacks on the south end of the building. Previously, Mr. O'Malley had stated that this product was stored in their Greenville storage location, but this is no longer the case. Per Mr. O'Malley the mixing and tableting process often results in the release of granular acid "sweepings"

onto the floor. Since KMI was not processing any tablets at the time of the inspection, KD could not verify at which point in the process the "sweepings" were being released. If the baghouse collection system were operating properly and all waste from the control device were being properly collected, there should be no "sweepings" on the floor to be collected and subsequently disposed of.

Per Chief Moore, the chlorine gas release that occurred on June 22, 2019 was caused by the exposure of these "sweepings" to water, resulting in a chemical reaction and the chlorine gas release. R 336.1370(1) requires that air contaminants (i.e the sweepings) be collected and disposed of in a manner to minimize the introduction of contaminants to the outer air. The result of the chlorine gas release due to the inadequate collection and disposal of the "sweepings" is a Violation of R 336.1370(1). A Violation Notice will be issued.

It was noted that the roof of the middle section of the building was heavily damaged, with several tarps used to divert water to 55 gallon drums for collection. There was evidence of fire damage in this area and the roof appeared corroded and there were several large holes in the roof. In some places the roof appeared to be held up by pallets. The south end of the building, where the trichloroisocyanuric acid process is, while less damaged, also had evidence of corrosion. Mr. O'Malley indicated to the Ionia County Building Inspector that they are slated to have the roof replaced in Mid-July. The Building Inspector went on to say that not only does the middle section of the building roof need to be replaced, but the southern end also would need to be replaced, and not patched, and he would be following up on the status.

Exempt Emission Units

The North end of the building houses the rest of the facilities operations. There are three (3) calcium chloride tablet presses that make tablets for ice/snow melt for roofs; no binding agent is used in this product. The supersacks where the calcium chloride raw material is kept appeared to be sitting in puddles of water. Mr. O'Malley stated that they were not producing any of this product at this time, since it is more of a seasonal product.

Injection molding also takes place at the north end of the building. This molding is for making urinal screens and urinal floor mats. The injection molding is exempt from Rule 201 permitting under Rule 286(2)(b). Prior to being molded, one of several scents are added to the raw material. Mr. O'Malley stated that the scents could be Cherry, Bubble Gum, Green Apple, or Cinnamon. Once the material is made, it gets cut into the correct shape for either the floor mat or the urinal screen. The cutting is exempt from Rule 201 permitting under Rule 285(2)(i)(vi)(B). The snow shovels are also made via injection molding.

Compliance Determination

Based upon the observations made during the inspections, Kassouni Manufacturing Inc. is in not in compliance. A Violation Notice will be issued for the improper collection and disposal of air contaminants per R 336.1370(1).

NAME Kaitlyn Davis DATE 7/3/2019 SUPERVISOR [Signature]