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

A801945965   FACILITY: UNISTRUT INTERNATIONAL CORPORATION   SRN / ID: A8019   LOCATION: 4205 Elizabeth Street, WAYNE   DISTRICT: Detroit			
LOCATION: 4205 Elizabeth Street, WAYNE DISTRICT: Detroit			
CITY: WAYNE COUNTY: WAYNE			
CONTACT: M. Kent Lewis , Safety & Environment Manager ACTIVITY DATE: 07/31/2018			
STAFF: Jill Zimmerman   COMPLIANCE STATUS: Compliance   SOURCE CLASS: SM OPT OUT			
SUBJECT: Target Inspection			
RESOLVED COMPLAINTS:			

DATE OF INSPECTION	:	7/31/2018
TIME OF INSPECTION	:	10:00 am
INSPECTED BY	:	Jill Zimmerman
PERSONNEL PRESENT	:	Kent Lewis
FACILITY PHONE NUMBER	:	734-727-4023
FACILITY EMAIL	:	mlewis@atkore.com

# FACILITY BACKGROUND

Unistrut International is an opt-out facility located in a light industrial/commercial/residential area just southwest of Michigan Avenue and Wayne Road. The facility produces metal framing and structure components which are used in the construction industry and metal step grading for the construction and automotive industry. Atkore International, the parent company, took control over Unistrut in December 2010.

Unistrut operates about two shifts per day, six days per week.

# **REQUIRED PPE**

For safety purposes, I wore steel toed safety boots, hard hat, safety glasses and hearing protections.

# **COMPLAINT/COMPLIANCE HISTORY**

No complaints have been issued to this facility during at least the last five years. No Violation Notices have been issued in at least the last five years.

# PROCESS EQUIPMENT AND CONTROLS

Unistrut produces metal shelving and brackets using metal working including stamping and zinc plating is also used on some parts. Light assembly, packaging, storage, and shipping of parts is also done onsite.

The heat-treating furnace (EU-HEATTREAT) is no longer being used at this facility. The furnace cannot operate due to required repairs. The cost of the repairs will exceed 50% of the value of the unit. I explained that a permit may be required should these repairs occur to make the furnace function again. The facility does not have plans at this time to repair or replace the furnace. Instead the facility is sending all heat treat work to a third party to be completed.

Some parts are coated in either a zinc plating line or a galvanization line. The zinc plating is used for more decorative and indoor purposes where less corrosion protection is needed. Galvanizing is done for parts to be used outdoors which need more corrosion protection.

http://intranet.deq.state.mi.us/maces/WebPages/ViewActivityReport.aspx?ActivityID=246... 9/25/2018

The zinc plating line (EU-ZNPLATING) uses a series of dip tanks to coat metal parts. The parts are dipped in two soap tanks and a rinse tank. Next the parts are electrocleaned, followed by surface activation (HCL to improve adhesion). Zinc plating is next, then rinse followed by brighter, an acid solution and a sealer. The emissions from the tanks are collected in vents and sent through a scrubber located on the roof. The major HAP emitted in this process is HCL, but actual HCL emissions are small. Wastes from the unit are run through an on-site wastewater treatment before disposal into the city sewer system. The facility is in the process of replacing this zinc line with a new line.

The hot dip galvanizing line, which was installed in 2008, uses a series of heated dip tanks for "prep coating". The parts are dipped into tank in the following order: soap, rinse, surface activation (HCL), rinse, flux (inorganic salts which improves adhesion). The parts are dried and then put into the zinc pot for galvanizing. The facility has submitted demonstration showing that the process is exempt from permitting under Rule 290. Emissions are controlled with a scrubber and are expected to be under 500 pounds per month as required by the exemption. The Rule 290 demonstration can be found in the facility file.

There are about fifteen presses both automatic and hand-fed and three nut lines which are exempt from permitting by Rule 285 (I)(i). In the "old pack" area, there are several "spring machines" which are used to attach metal springs to nuts, which are exempt form permitted by Rule 285 (I)(i).

The "Skinny Dipper" (EU-SKINNYDIPPER) and two burn-off ovens (EUBLU-SURF-OVENS) have been removed from the facility in 2004. The facility installed a soil vapor extraction (SVE) system in May 2007 to remove TCE from the soil. The SVE system equipment has been removed from the facility, though the facility continues to monitor the site.

The remainder of the facility is used for warehouse space or shipping and receiving space. There is one boiler on site, which is rated at 300,000 BTU/hr and operates on natural gas. This boiler is exempt from permitting by Rule 282 (b)(i).

# **INSPECTION NARRATIVE**

I arrived at the facility and met with Mr. Lewis. Mr. Lewis explained that some changes to the facility since the last inspection included sending heat treated parts offsite to be treated. The facility was also working to revamp the zinc plating line. After discussing the changes, we walked through the facility. During the onsite inspection, the scrubber for the galvanizing line appeared to be operating properly. The zinc plating line was not operating since it was under construction and the scrubber was not operating as the line was not operating. I saw the heat treating furnace, and it was clear that it could not operate without repairs.

# APPLICABLE RULES/PERMIT CONDITIONS

Permit 180-02 is an opt-out permit.

EU-BLU-SURF-OVENS – This emission unit was not evaluated since it has been removed from the facility

EU-HEATTREAT – This emission unit was not evaluated since it cannot be operated at this time. The facility informed that should they choose to repair the unit, a new permit may be necessary since the cost of the repairs is greater than 50% the cost to replace the unit. The facility plans to continue to send all parts needing heat treating off site for treatment.

EU-ZNPLATING – This emission unit was not evaluated. This unit is currently being revamp

and the facility feels that the newly revamped process will be exempt from permitting. During the onsite inspection, the zinc plating line was not operating.

EU-SKINNYDIPPER – This emission unit was not evaluated since it has been removed from this facility.

# **EU-FACILITY**

Emission Limits (5.1a-5.1c) – Compliance. The zinc line has emissions of HCL, which is the only HAP emitted at this facility. Based on the reported emissions in MAERS for 2017, the facility emitted less than 0.15 tons, which is below the limit of 9 tons per year individual HAP and 22.5 tons per year aggregate HAPS. 5.c was not evaluated for VOC since the majority of the processes covered in this permit are no longer at this location.

Testing (5.2) – NA – Emission testing is not required at this time.

# Recordkeeping/Reporting/Notification

5.3 Compliance – The facility maintained a binder in the office of the MSDS for all chemicals used at the facility. This binder was reviewed during the onsite inspection.

5.4, 5.5 Undetermined – The monthly records were not reviewed since most of the processes at this location either were not operating or are no longer at this location.

# MAERS REPORT REVIEW

The MAERS was received on March 16, 2018 and was reviewed on April 23, 2018. It appears to have been submitted accurately. Mr. Lewis is the facility contact for all MAERS inquiries.

# FINAL COMPLIANCE DETERMINATION

Unistrut appear to be operating in compliance with all state and federal regulations as well as all evaluated permit conditions. The facility was interested in exploring options to determine if the Opt-Out permit was still required since the majority of the equipment has been removed from the facility or no longer operates. The email that I sent to the facility with this information is attached to this report.

NAME

SUPERVISOR\_\_\_\_