

DEPARTMENT OF ENVIRONMENTAL QUALITY  
AIR QUALITY DIVISION  
ACTIVITY REPORT: On-site Inspection

B153458460

FACILITY: GRAPHIC PACKAGING INTERNATIONAL, LLC		SRN / ID: B1534
LOCATION: 79 EAST FOUNTAIN STREET, BATTLE CREEK		DISTRICT: Kalamazoo
CITY: BATTLE CREEK		COUNTY: CALHOUN
CONTACT: Brock Mollitor , EHS Manager		ACTIVITY DATE: 06/10/2021
STAFF: Amanda Chapel	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MAJOR
SUBJECT:		
RESOLVED COMPLAINTS:		

On Thursday June 10, 2021, Air Quality Division's (AQD) Amanda Chapel (staff) requested and received records from Graphics Packaging International located at 79 Fountain Street E, Battle Creek, Calhoun County, Michigan. These records were submitted to show compliance with permit MI-ROP-B1534-2016 and all other applicable state and federal air quality regulations. The facility is considered a major source for nitrogen oxides (NOx) and during the last inspection on August 1, 2019, was in compliance with all applicable requirements. Due to the ongoing COVID-19 pandemic, the Department has given instructions to reduce the amount of time on site, and as such, records were requested to review before the on-site inspection, scheduled for Monday June 19, 2021.

Graphic Packaging is a 100% recycled paperboard plant that produces both 6-ply and 7-ply paper roll stock on two paperboard machines for consumer packaging. The majority of what they make is paperboard for food packaging. They employ about 200 people who work either 12-hour shifts or 3 8-hour shifts, 7 days a week. The facility has four 3.5 MMBtu/hour natural gas space heaters, which are considered exempt under Rule 282(2)(b)(i), and a paper rewind machine, a core cutter machine, and a small sand blaster, which are all considered exempt under Rule 285(2)(l)(vi)(B). The facility has one boiler and five cold cleaners. The following encompasses both the records review and on-site inspection.

Mr. Brock Mollitor is the EHS contact for the facility. He provided both the records and the on-site inspection information and joined the AQD on the walkthrough. In general, the plant takes deliveries of wastepaper to be recycled. This paper is pre-sorted to either be filler, top, or bottom layers. This is conveyed to one of the four pulpers. The pulp is delivered to one of two paper machines where the paper is rolled, starch and topcoat added, and dried. This is then sent to the rewinder and cut to appropriate size and sent to shipping. Water is used in the boiler to create steam which is both used in the turbine to create electricity for the plant and then sent to the paper machines to dry the paper, which is then sent back to the boiler to be used again.

#### EUBLR001

This is a 185 MMBtu/hour, 140,000 pounds steam/hour Babcock and Wilcox boiler for the production of process steam and electricity. The boiler is restricted to firing natural gas only. The modified boiler is equipped with waste heat recovery and low NOx burners.

The facility provided records showing the monthly and 12-month rolling NOx emissions and natural gas usage for EUBLR001. From December 2019 to December 2020, the highest NOx

emissions were 68.4 tpy 12-month rolling and highest natural gas usage was 1,145.7 MMscf 12-month rolling, both in December 2020. This is below the permitted limits of 95.2 tpy NOx 12-month rolling and 1,589 MMscf 12-month rolling.

The facility uses only pipeline quality natural gas in the boiler. Mr. Mollitor said that No. 6 fuel oil use was decommissioned in 2014. The boiler runs 24/7. Boiler maintenance is typically during the site-wide maintenance shut down that happens once per year. There is a turbine associated with the boiler which runs to supply the plant with about 15-20% of it's electricity. Both were running at the time of the inspection. No visible emissions were seen during the inspection.

#### FGPAPERMACH12

Paper Machine No. 1 is used to manufacture paperboard stock and includes wet and paperboard coater 1 and drying oven 1. Paper Machine No. 2 is used to manufacture paperboard stock and includes wet and paperboard coater 2 and drying oven 2. They were both running at the time of the inspection.

The facility provided records demonstrating compliance with the permitted limits. The facility is keeping hourly operational records monthly for paper machine 1 and 2 as well as total run hours for the month. Highest total run hours from January-December 2020 was 1,402.4 hours in July 2020.

The facility is also tracking each coating used, by weight, monthly. These records include the weight percent of VOC as well as weight percent of each individual HAP contained within the formulation. Highest VOC pounds per calendar day, calculated monthly was in September 2020 with 149.1 pounds/calendar day which is below the permitted limit of 173.74 pounds/calendar day. Highest annual emission rate of VOC on 12-month rolling basis is in December 2020 at 24.95 tpy. VOC content minus water in the coating, monthly is 0.0276 pounds/gallon, below the 0.05 pounds/gallon limit.

Individual and total HAPs are being tracked, by HAP, per coating, at the facility. Recordkeeping has each HAP content, listed, by coating, and usage rate. Highest total HAP emission was in December 2020 with emissions at 2.71 tons/12-month rolling which is below the permitted 4.85 tons/12-month rolling. Vinyl acetate is the highest recurring HAP and the highest 12-month rolling emission occurred in 1.91 tons/12-month rolling time period, below the permitted 3.77 tons/12-month rolling time period.

Acetaldehyde is being tracked as a permitted HAP and part of the total. Highest monthly emissions in pounds per hour (pph) were between 0.07 and 0.08 pounds/hour which is below the permitted 0.25 pounds/hour. Highest annual rate of emissions of acetaldehyde is 0.60 tons/12-month rolling period which is below the permitted 1.08 tons/12-month rolling period.

#### EUSTARCHSILO

The storage silo is for process starch. The facility is tracking starch deliveries and visible emissions while starch is being unloaded. The last delivery occurred on June 1, 2021. The initials of the

person who completed the visible emissions check are written on the form as well as if there are any emissions seen or if it's clear. On June 1, 2021, there were no emissions. Additional starch deliveries and emissions reports were viewed on site.

The facility also provided the baghouse maintenance log. The most recent date maintenance was performed was April 26, 2021. A hole in the hatchway riser on the roof was discovered. Corrective action was completed on May 2, 2021. This was not a result of the starch silo emissions. Corrective action was performed on February 27, 2017 and December 18, 2017 due to visible emissions from the baghouse.

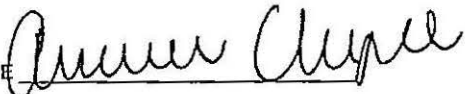
This was not being filled during the inspection. Records for fillings in May and June were reviewed. Starch was delivered on May 1, 5, 18, and 25 as well as June 1 and 10. Visible emissions readings were taken during the deliveries. The deliveries of starch occur between every 7-10 days. Mr. Mollitor and I walked to the roof to observe the starch silo dust collector. It appears to be clean around the collector.

#### EUCOLDCLEANERS

This emission unit includes any cold cleaner that is grandfathered or exempt from Rule 201 pursuant to Rule 278 and Rule 281(2)(h) or Rule 285(2)(r)(iv). Existing cold cleaners were placed into operation prior to July 1, 1979. New cold cleaners were placed into operation on or after July 1, 1979.

The facility has five cold cleaners located in the electrical area, maintenance shop, mechanics shop, forklift repair area, and powerhouse workshop. These were in use, with the lid closed., during the inspection. The facility uses Crystal Clean 142 Mineral Spirits which does not contain any halogenated compounds. The units are not heated or agitated. These are considered exempt under Rule 281(2)(h).

The facility appears to be in compliance with all applicable state and federal air quality regulations.

NAME  DATE 6/16/2021 SUPERVISOR R12 6/25/21