

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

B546563426

<b>FACILITY:</b> DRAYTON IRON AND METAL CO		<b>SRN / ID:</b> B5465
<b>LOCATION:</b> 5229 WILLIAMS LAKE RD, DRAYTON PLNS		<b>DISTRICT:</b> Warren
<b>CITY:</b> DRAYTON PLNS		<b>COUNTY:</b> OAKLAND
<b>CONTACT:</b> Tom J. Spurgeon , Administrative Director		<b>ACTIVITY DATE:</b> 06/17/2022
<b>STAFF:</b> Adam Bognar	<b>COMPLIANCE STATUS:</b> Compliance	<b>SOURCE CLASS:</b> MINOR
<b>SUBJECT:</b> Scheduled Inspection		
<b>RESOLVED COMPLAINTS:</b>		

On June 17, 2022, Michigan Department of Environment, Great Lakes, and Energy-Air Quality Division (EGLE-AQD) staff, I, Adam Bognar conducted a scheduled inspection of Drayton Iron & Metal (the "facility") located at 141 East Montcalm, Pontiac 48342. The purpose of this inspection was to determine the facility's compliance status with the Federal Clean Air Act; Article II, Part 55, Air Pollution Control of Natural Resources and Environmental Protection Act, 1994 Public Act 451; Michigan Department of Environment, Great Lakes, and Energy, Air Quality Division (EGLE-AQD) rules; 40 CFR Part 60, Subpart OOO – Standards of Performance for Nonmetallic Mineral Processing Plants (NSPS OOO); and Permit to Install No. 398-75A.

I arrived at Drayton Iron & Metal at around 12 pm. I met with Larry Throesch, Manager. I identified myself and stated the purpose of the inspection. Larry gave me a tour of the facility. I briefly met with Stacey Spurgeon, co-owner. Stacey showed me their production records while I was on-site.

Drayton Iron & Metal operates a metal scrapyard and a concrete crusher at this location. At the metal scrapyard, the facility receives metal pieces from various sources, sorts them, cuts/sheer/crushes them to reduce size, then ships them to a foundry that purchases the recycled metal.

Additionally, the facility receives concrete chunks from various demolition/construction projects. These chunks are fed to a concrete crusher that reduces the size of the chunks to uniform size (approximately 4 inch and 1 inch diameter chunks).

In a previous inspection of this facility, I observed torch cutting being performed outdoors. Since the torch cutting is/was performed outdoors with no emission control, torch cutting at Drayton Iron & Metal is not exempt from the AQD Rule 201 requirement to obtain a permit to install. A violation notice was sent to Drayton Iron & Metal on June 19, 2019 seeking compliance with Rule 201.

Rather than apply for a permit to install, Drayton Iron & Metal decided to construct an enclosure/filtration system to capture torch cutting emissions. Torch cutting is exempt from the requirement to obtain a permit to install if it does not adversely affect the surrounding area and has emissions that are released only into the general in-plant environment and/or that have externally vented emissions equipped with an appropriately designed and operated enclosure and fabric filter.

Larry showed me the torch cutting enclosure. The enclosure is a three-sided structure built from shipping containers ("Connex boxes"). The walls are each two containers tall. A heavy-duty tarp is draped over the top of the structure to create a roof. There are several fan inlets located in the back wall of the structure which are designed to draw air from the torch cutting and push it through a filter system. The filter system is constructed from an industrial air conditioning unit with additional filters stuck inside it. The air conditioning unit also has fans that pull air through the fabric filters. The enclosure is relatively large since this facility needs to be able to torch cut large materials such as "I" beams.

Previously, the inlet fans for drawing in the torching smoke were located 15 feet higher than the actual torch cutting.

Staff at Drayton Iron & Metal demonstrated torch cutting in this enclosure during a previous inspection on August 26, 2020. After this demonstration, I informed Larry that the enclosure is not adequately capturing the torch

cutting emissions. I told Larry that I have never seen a dust collector system equipped with fans instead of blowers. Fans are generally not designed to blow against resistance, such as a filter. I also questioned whether the fans would ever be powerful enough to draw torch cutting emissions 10-15 feet upwards.

Larry said he would attempt to improve the structure. He procured a powerful blower to replace the fans in the enclosure; however, the blower proved to be too powerful. The amount of suction created by the new blower nearly blew the doors off the enclosure.

Larry purchased an additional shear for the facility to further reduce the need for torch cutting. The new shear attaches to a backhoe. The other shear, used for smaller items, is located inside the Quonset hut. No emissions are expected from the shearing process.

Larry stated during this inspection that Drayton Iron & Metal is not currently torch cutting any materials. All materials are either sheered or broken apart with a large wrecking ball. I observed a large 7,000 lb steel wrecking ball near the torching area. Larry stated that he will not torch cut any materials unless the fabric filter/enclosure system is functioning properly.

Larry is installing a new blower system that he believes will work once finished. The new blower appears to be more appropriately sized for this operation. Drayton Iron & Metal may torch cut on a limited basis to test this emission collection system. Larry mentioned that he had tested this new system and he believes it works on days with low wind. He wants to make some improvements to improve smoke capture. Larry said they have moved away from anything that requires torching, but occasionally they receive something that cannot be processed another way. Currently, those items are backed up at the facility. I observed several scrap construction vehicles on-site that will likely need to be torch cut or shipped somewhere else for processing.

There were several scrap engines inside the torching enclosure during this inspection. Larry stated that the engines are being disassembled, not torch cut. I did not see any evidence that the engines have been torch cut. It appears that the torch cutting enclosure is now being used as a storage/staging area for other scrapping operations. This makes sense given the size and location of the torching enclosure. The wrecking ball is able to crush materials inside this torching structure. Larry stated that the torching enclosure is not being used to torch cut engines. I re-iterated to Larry that Drayton Iron & Metal is not allowed to torch cut in that enclosure unless it is capturing all torching smoke and filtering it through a properly designed and operated fabric filter system pursuant to Rule 285(2)(j).

#### **Permit to Operate No. 398-75A**

PTI No. 398-75 was issued in 1988 for a jaw crusher, conveyor belt, screens, and magnetic separators. The original crushing plant was designed to process foundry slag which contained a high amount of iron. Currently this equipment is still operated, but it is now only used as a concrete crusher – no foundry slag is processed.

Because this feedstock has changed, I requested that Drayton Iron & Metal update their permit to install. PTI No. 398-75A was issued to this facility on March 3, 2021.

#### **EUPROCESS**

This emission unit consists of crushing process equipment including screens, crushers, feeders, conveyers, ect. Emissions from crushing and drop points and controlled using water sprays.

Section I – SC 1: Limits opacity from drop points and transfer points to a six-minute average of 10%. I did not observe any opacity from EUPROCESS during this inspection. I observed that the crusher was operating and the water sprays running.

Section II – SC 1: States that the permittee shall not process any asbestos tailing or waste materials containing asbestos in EUPROCESS. Larry stated that no asbestos materials are processed. Only concrete material is crushed. I did not see any evidence of crushed materials other than concrete. Occasionally, a piece of metal or debris makes it into the crusher, but Drayton Iron & Metal does their best to remove any metal/scrap from the concrete prior to crushing. Customers do not want metal in their gravel.

Section II – SC 2: States that the permittee shall not process more than 25,000 tons of material through EUPROCESS per 12-month rolling time period. This facility began operating the crusher under this new permit on June 24<sup>th</sup>, 2021. Larry provided me with records of the amount of material crushed since the new permit was issued. There has only been one 12-month period since the permit was issued. The records I reviewed show that 14,635 tons were processed in the crusher during the 12-month period ending in May 2022. I told Stacey Spurgeon that in future inspections, I will need to see a new 12-month total each month.

Section III – SC 1: States that the permittee shall not operate any portion of EUPROCESS unless each portion of EUPROCESS meets the specific opacity limit from Appendix A of this permit. I did not notice any opacity from EUPROCESS during this inspection.

Section III – SC 2: States that the permittee shall not operate EUPROCESS unless the fugitive dust plan for all plant roadways, the plant yard, all material storage piles, and all material handling operations specified in Appendix B of this permit has been implemented and maintained. Based on my observations during this inspection, the fugitive dust plan is adhered to. I did not notice any opacity from the storage piles or crushing process. There was not significant track-out onto the road outside the facility exit.

I did notice some opacity from the truck traffic driving around the site. There is an area near the crusher inlet that the water truck has trouble reaching. There was also a small amount of opacity generated when materials are picked up or set down from storage piles. The weather during this inspection was sunny and very windy. Wind was 32 miles per hour from the west-northwest according to wunderground.com, Waterford data. Historical wind data on wunderground.com shows that this is the strongest wind the facility has experienced since starting operations this season. Section 324.5524 of the NREPA Act 451 states, in part, that opacity limits relating to fugitive dust from storage pile material handling activities shall not apply when wind speeds are greater than 25 mph. No violation will be issued for the opacity observed on this day.

According to Larry and the records I reviewed, the grounds are wet three times per day. Once in the morning before crushing starts, once after the mid-morning break, and one more time after lunch break. I could see evidence that the ground had been wet the day of my inspection. I observed facility staff wet the grounds after their lunch break. I explained to Larry that he needs to make sure that the facility grounds are wetted even more frequently on windy days.

Section III – SC 3: States that the permittee shall comply with all provisions of the federal Standards of Performance for New Stationary Sources as specified in 40 CFR Part 60 Subparts A and OOO (NSPS OOO), as they apply to EUPROCESS.

Drayton Iron & Metal must perform Method 9 visible emission readings on EUPROCESS in accordance with NSPS OOO. During my previous inspection, I explained this to Larry and in an email to the facility owners. During this inspection, Larry informed me that Drayton Iron & Metal has not performed this test. A violation notice was sent to the facility for this non-compliance. Drayton Iron & Metal had until December 21, 2021 to perform this test.

I did not request monthly records of water spray nozzles pursuant to 60.674 (b) during my site-visit. This data is not recorded on the record sheet which shows both production data and dates/times the site grounds are watered. I notified Drayton Iron & Metal that they are required to perform monthly periodic inspections to check that water is flowing to discharge spray nozzles in the wet suppression system. Drayton Iron & Metal stated that although they perform these checks each day and will not operate the crusher if the water spray nozzles are not functioning; however, they have not been documenting these checks.

A violation notice will be sent to Drayton Iron & Metal for failing to keep records of monthly checks on the water spray nozzles. This inspection is not explicitly required by Permit to Install No. 398-75A. I observed the spray nozzles functioning properly during this inspection.

Based on my observations, the facility is in compliance with all other requirements of NSPS 000.

Section IV – SC 1: States that the permittee shall not operate any portion of EUPROCESS unless the equipment's specified control device is installed, maintained, and operated in a satisfactory manner as listed in Appendix A. I observed that the water spray control technology was functioning during my inspection. There is a water spray before and after the crushing process. The water sprays appeared to adequately cover the concrete material such that no opacity was observed.

Section IV – SC 2: States that the permittee shall install and maintain a scale on the loader that feeds the crusher which continuously shows the daily throughput rate for the conveyor. There is no scale on the loader at this facility. Drayton Iron & Metal has a scale installed at the entrance of their facility. To weigh the raw materials, the loader driver weighs the empty loader, picks up a load of raw concrete, then re-weighs the loader. The difference between these two weights is the throughput of the crusher. This appears to be an acceptable way for materials to be weighed at this facility although it differs from permit language slightly.

Section V – SC 1: Requires the permittee to evaluate visible emissions from EUPROCESS within 180 days of commencing trial operation. Trial operation commenced on June 24, 2021. During my previous inspection, I explained to Drayton Iron & Metal that they will need to have a staff member get a Method 9 certification or have someone with a certification come out to do readings. I also explained that they should try and do the visible emissions test before the end of the 2021 crushing season (ends after freezing temperatures). I emailed the facility links to the two Method 9 certification businesses that I am aware of (Aeromet and Eastern Technical Associates).

Drayton Iron & Metal never completed this visible emission observation. A violation notice will be sent to the facility for this non-compliance. Drayton Iron & Metal had until December 21, 2021 to perform this test.

Section VI – SC 1,2: Specifies recordkeeping requirements for this facility. The facility is required to keep daily and monthly records of the amount of material processed through EUPROCESS. This data must be used to calculate an annual throughput rate based on a 12-month rolling time period. These records are maintained. Drayton Iron & Metal provided me with daily and monthly throughput records for June 2021 through May 2022. Also included on this record sheet is the amount of raw materials brought on site and each time water/dust suppressant is applied to the plant grounds & storage piles. The facility notes days the crusher did not operate and when dust suppressant was not applied due to rain. These records can be found on the AQD shared drive at the following address: S:\Air Quality Division\STAFF\Bognar, Adam\Inspection Documents\Drayton Iron & Metal 2022.

Section VII – SC 1,2: Specifies reporting requirements. Drayton Iron & Metal must notify the AQD within 30 days after the installation of this crusher. This requirement does not apply to this facility because they have operated the same crusher at this site since 1988. The only modification since then has been a change in feed stock that happened in the 1990's.

Section IX – SC 1: States that within 45 days of this permit, the permittee shall label all equipment using the company ID numbers in Appendix A. I verified that the equipment at this facility is labeled appropriately. The facility notified AQD that this equipment was labeled on June 25, 2021.

#### **EUTRUCKTRAFFIC**

Section I – SC 1: Limits opacity from EUTRUCKTRAFFIC to 5%. Compliance with this limit must be demonstrated using Test Method 9D. I did notice some opacity from the truck traffic on-site during this inspection; however, I did not perform a Method 9D visible emissions reading. The opacity that I observed was intermittent and coming from only a few areas where picking up and dropping material occurs. AQD has not received any recent complaints about this facility. I explained to Larry that if we get complaints about dust, then Drayton Iron & Metal may need to implement additional dust controls.

Section III – SC 1: States that the permittee shall not operate EUTRUCKTRAFFIC unless the fugitive dust control plan is implemented and maintained. Based on my observations during this inspection, the fugitive dust control plan has been implemented correctly. Stacey Spurgeon showed me records indicating that the grounds are wet three times per day. When it rains, the facility writes “Rain” instead of documenting their normal water applications. The grounds were wet when I arrived, and I observed a water truck on site. Additionally, the facility recently purchased a fire truck to replace/supplement their deteriorating water truck. The fire truck is better able to spray areas that the water truck misses.

#### **EUSTORAGE**

Section I – SC 1: Limits opacity from EUSTORAGE to 5%. Compliance with this limit must be demonstrated using Test Method 9D. I did not notice any opacity from the storage piles during this inspection. The crushing process was operating and gravel was being conveyed onto the storage piles. Larry stated that the storage piles usually only cause dust after a few days without rain. The piles are wetted as needed according to the fugitive dust plan.

Section III – SC 1: States that the permittee shall not operate EUSTORAGE unless the fugitive dust control plan is implemented and maintained. Based on my observations during this inspection, the fugitive dust control plan has been implemented correctly. The drop distance between the conveyor belt exit and the gravel pile is minimized as much as possible. The equipment is not designed to go any lower than its current setup. The piles were not recently wetted during my inspection, but I did not observe any opacity from the storage piles while the crusher operated.

I left the facility at around 1:30 pm

#### **Compliance Determination**

Drayton Iron & Metal failed to perform a Method 9 visible emissions reading on EUPROCESS within 180 days after the issuance of PTI No. 398-75A. This is a violation of NSPS OOO and PTI No. 398-75A Section V – Special Condition 1. Additionally, Drayton Iron & Metal failed to maintain documentation of monthly checks on the water spray nozzles on the crushing process. This is a violation of NSPS OOO 60.674(b). A violation notice was sent to the facility to address these two issues.

Based on my observations and record review, Drayton Iron & Metal is in compliance with all other applicable AQD requirements.

NAME Adam Bognar

DATE 6/30/2022

SUPERVISOR K. Kelly