EPA United States Environmental Protection Agency

EPA Region 5 Enforcement and Compliance Assurance Division

INSPECTION REPORT

Inspection Entry Date/Time	12/13/2022 08:00 AM (ET)	Announced: No
Inspection Exit Date/Time	12/13/2022 02:05 PM (ET)	Access: Granted
Weather	Cloudy	
Media	Water	
Statute(s)/Program(s)	Clean Water Act, National Pollutant Discharge Elimination System (NPDES), Industrial	
Type of Inspection	CEI - Compliance Evaluation Inspection	
Permittee Name	Eramet Marietta Metallurgical Plant	
Facility or Site Name	Eramet Marietta Metallurgical Plant	
Facility/Site Physical Address	16705 Rt 7 South, Riverview	
City, State, Zip Code	Marietta, Ohio 45750	
County/Borough/Parish	Washington County	
Facility GPS Coordinates	39.372906, -81.523579	
FRS ID	110000741966	
Permit Number(s) (If Applicable)	OH0004006	
SIC and/or NAICS	3313	
Regulatory Representatives Participating in Inspection:		

Title	**Name**	**Organization**
Inspector	Jake Berger	EPA Region 5
Inspector	William Jones	EPA Region 5

Lead Inspector:			
Jake Berger	Berger, Jake Digitally signed by Berger, Jake Date: 2022.12.29 14:20:28 -06'00'		
	EPA Region 5	Berger.Jake@epa.gov	(312) 353-8024
Supervisor Review:			
Molly Smith			
	EPA Region 5	Smith.Molly@epa.gov	

SECTION I – INTRODUCTION

Site Entry and Inspection Objectives

EPA Region 5 Lead Inspector, Jake Berger, arrived at the Eramet Marietta Metallurgical Plant (the "Site" or "Facility"), located at 16705 Rt 7 South, Riverview, Marietta, Ohio 45750, at 08:00 AM (ET) on 12/13/2022 for an unannounced inspection. EPA Region 5 Lead Inspector presented credentials to Mark Carpenter and informed the Facility that this was an EPA Region 5 inspection to determine compliance as authorized by Clean Water Act (CWA) Section 308 and implementing regulations. This report is based on information supplied by Eramet Marietta Metallurgical Plant representatives, direct observations made by the EPA Region 5 inspector, records and reports maintained by the permittee and other information including: photographs taken by EPA Region 5 inspector(s), physical evidence collected by the EPA Region 5 inspector(s), measurements taken by EPA Region 5 inspector(s), verbal or written statements made by information supplied by Eramet Marietta Metallurgical Plant representatives during or subsequent to the on-site Inspection, and materials, processes, data, photographs, or documents shown, demonstrated, or submitted to the EPA Region 5 inspector(s) by Eramet Marietta Metallurgical Plant representatives during or subsequent to the on-site Inspection. In addition, information gathered prior to or subsequent to the Inspection from a review of EPA, State, and/or public records may be included in this report.

Attendees

Organization	Attendee Name	Title	Present in Opening Conf.	Present in Closing Conf.
EPA Region 5	Jake Berger	Lead Inspector	Yes	Yes
EPA Region 5	William Jones	Inspector	Yes	Yes
Eramet Marietta	Mark Carpenter	Environmental Engineer	Yes	Yes

Facility/Site Description

EPA Region 5 lead inspector confirmed the following facility information:

Eramet is a facility that performs smelting of high carbon ferromanganese to low and medium carbon ferromanganese to be used as an alloy in steel production. Eramet is authorized to discharge pollutants in accordance with their NPDES permit # 0ID00001*GD issued by the Ohio Environmental Protection Agency with Application # OH0004006.

The Facility is located at 16705 State Route 7 South, Marietta, Washington County, Ohio in a heavy industrial area located along the Ohio River. The Facility was initially constructed in the early 1950s by the Union Carbide Corporation (UCC) as part of a larger UCC-owned facility for the manufacturing of ferroalloys and polystyrenes. The operations were sold to Elkem Metals in 1981 and thereafter to Eramet Marietta, Inc. (EMI) in 1999. EMI currently operates a metallurgical manufacturing facility that manufactures manganese alloys such as silicomanganese, ferromanganese and other manganese products. The EMI Main Facility is located in the central portion of the property and includes the core of EMI's operations, encompassing 21.3 acres of the Site. The Facility and outbuildings total 525,644 gross square feet. The Facility is surrounded by other commercial and industrial facilities to the east and west. The northern portion of the property consists of 734.54 acres, containing mostly undeveloped land and a 92-acre wastewater/sludge impoundment, hereafter referred to as the North Impoundment. The southern portion of the Facility's property (south of Route 7), which is adjacent to the Ohio River, includes the EMI wastewater treatment plant (WWTP), a former sludge storage pond, three operating sludge storage ponds, Mid-Ohio Valley Lime Company, and a closed fly ash landfill.

According to the United States Geological Survey (USGS) Fleming/Parkersburg/Marietta/Valley Mills Quadrangle Topographic Map, the nearest body of surface water to the Facility is the Ohio River adjacent to the Facility to the south. On-site catch basins direct storm water to the Ohio River via six (6) NPDES-permitted outfalls. All direct contact storm water runoff at the Main Facility enters the on-Property storm sewer system and discharges to the Ohio River through Outfall 003.

Eramet and Energizer renewed their agreement in 2001 to have Eramet receive Energizer's wastestreams. Energizer is an electrolytic manganese manufacturer that has a wastestream that discharges to Eramet's UNOX (Union Carbide Oxidation Process). UNOX is a legacy treatment system that contains a lime silo for treating the wastestream from Energizer containing acidity and manganese. Energizer's principal waste stream is manganese rich and acidic. The goal of these wastestreams is for Energizer to reuse them. If their recycling tank is too full, they discharge to UNOX. The wastestream is treated by adjusting the pH 10.5 or higher to create a manganese hydroxide and clarifies in the north impoundment, through Outfall 605, and exits through Outfall 003 into the Ohio River. Eramet can reject Energizer's wastestream if it causes Eramet to be unable to treat the wastestream.

The Eramet onsite sanitary treatment facility is run by operator of record Steve Elliot, City of Marietta chief operator, Class 1.
Eramet has had no sludge disposal since 2019.
In April 2022, Eramet started to dose the influent with higher amounts of lime, effectively maintaining the pH of the treatment process above 10.5 to facilitate the precipitation of manganese hydroxides. Eramet is confident that the improvements at the UNOX system make Eramet capable of handling the manganese and acidity received from Energizer.

Facility/Site Information

Have there been or are there plans to make changes in the process(es) that will cause a new, different, or increased discharge?	Plans to decrease total water usage by changing from open loop to closed loop cooling system.
Do you use in-house or contract out for laboratory analyses? Or both?	In-house for most analyses. Contract out testing for phenols, cyanide, lead, cadmium, barium, fecal, BOD, and sludge analysis to Microbac.
Do you self-monitor and keep monitoring records?	Yes
Outfalls (and do the numbers and locations match the permit?)	6
Size of Facility	1,084 acres
What are the raw materials used?	Coal, coke, manganese ore, carbon electrode paste
Type of Operation	Smelting
What is the principal	Ferromanganese and silica manganesae

product generated?	
Responsible official verified	Marc Mounier-vehier
Industrial Sector/Sub-sector	3313

Locations

Location/Area/Sub-area	Description
Outfall 003	Combined discharge of storm water, noncontact cooling, treated process and sanitary wastewaters (outfalls 602, 603, and 605) to Ohio River. (Lat: 39° 21' 51"; Long: -81° 31' 12")
Outfall 007	Discharge from Elkem fly ash disposal area surface runoff to Ohio River. No monitoring required. (Lat: 39° 21' 58"; Long: -81° 30' 48")
Outfall 008	Discharge from Elkem fly ash disposal area leachate treatment system prior to mixing with AMP Ohio's bottom ash pond discharge via drainage way to the Ohio River. (Lat: 39° 21' 51"; Long: -81° 30' 55")
Outfall 602	Discharge from sewage treatment plant after disinfection and prior to combining with outfall 0ID00001003. (Lat: 39° 21' 52"; Long: 81° 31' 12")
Outfall 603	Discharge from process sludge settling ponds prior to combining with other wastewaters tributary to outfall 0ID00001003; samples to be taken from Manhole #492. (Lat: 39° 21' 55"; Long: -81° 31' 28")
Outfall 605	Discharge from sludge storage impoundment prior to combining with other wastewaters tributary to outfall 0ID00001003; samples to be taken at Manhole #497. (Lat: 39° 22' 26"; Long: -81° 31' 22")
Sample point 589	Sludge removed from the sanitary waste water treatment plant for final disposal.
Sanitary treatment facility	
Settling Ponds	Clarification of scrubber wastewater.
UNOX wastewater treatment system	Union Carbide Oxidation Process, location of lime addition.
Wastewater solids north impoundment	

SECTION II – OBSERVATIONS

Location: Settling Ponds		
Observation #: JB4-OB-001	**Date:** 12/13/2022	**Weather:**
Addition of ferrosulfate in setting pond recirculation to induce a reduction reaction of chrome 6 to chrome 3. Sampling occurs here at location 008.		
Photo(s) 1. IMG-20221213110656656208986.jpg		

Location: Outfall 003

Observation #: JB4-OB-002	**Date:** 12/13/2022	**Weather:**
Sampling location for Outfall 003, including monitoring for chlorine and pH. Flow rate at 003 is calculated as the sum of GRD (Good River Distribution) intake for Eramet + flow at 605 + flow at 602 + flow at 603.		
Photo(s) 1. IMG-20221213112414241420931 6.jpg		

Location: Outfall 602		
Observation #: JB4-OB-003	**Date:** 12/13/2022	**Weather:**
Sampling location for 605, acting as a clarifier, which then flows to 003.		
Photo(s) 1. IMG-20221213113214321419976 6.jpg		

Location: Outfall 603		
Observation #: JB4-OB-004	**Date:** 12/13/2022	**Weather:**
Outfall 603, containing scrubber recycle water.		
Photo(s) 1. IMG-20221213114353435328811 6.jpg		

Location: UNOX wastewater treatment system		
Observation #: JB4-OB-005	**Date:** 12/13/2022	**Weather:**
UNOX treatment system		
Photo(s) 1. IMG-20221213115412541255971 9.jpg		

Location: Outfall 605		
Observation #: JB4-OB-006	**Date:** 12/13/2022	**Weather:**
Outfall 605, flow monitoring and composite sampling		
Photo(s) 1. IMG-20221213120353353677965.jpg		

Location: Wastewater solids north impoundment		
Observation #: JB4-OB-007	**Date:** 12/13/2022	**Weather:**
Final resting place for manganese hydroxide.		

Photo(s)

1. IMG-20221213121209129179269.jpg

ERAMET MARIETTA METALLURGICAL PLANT		
Observation #: JB4-OB-008	**Date:** 12/13/2022	**Weather:**
Diesel refueling tank with containment		

Photo(s)

1. IMG-20221213122729272959154 8.jpg

SECTION III – RECORDS REVIEW

Records may not be in sequential order.

Record: Compliance Monitoring & Enforcement Report		**AOC:** Yes
Ref #: JB4-RR-007	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022
No records of completed Routine Facility Stormwater Inspections.		
Record: Personnel Training		**AOC:** No
Ref #: JB4-RR-006	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022
Reviewed SPCC (Spill Prevention Control and Countermeasure) and SWPPP (Storm Water Pollution Prevention Plan) annual employee trainings to satisfy NPDES permit requirements.		
Record: Compliance Monitoring & Enforcement Report		**AOC:** Yes
Ref #: JB4-RR-005	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022
No records for any Stormwater Annual Reports since the NPDES permit became effective in 2019.		
Record: Other - Quarterly Visual Stormwater Assessment		**AOC:** No
Ref #: JB4-RR-004	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022
Reviewed Quarterly Visual Stormwater Assessments to satisfy NPDES permit requirements.		
Record: Process Description/Flow Diagram		**AOC:** No
Ref #: JB4-RR-003	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022
Line Diagram: General sanitary wastewater flow		

Photo(s)

1. IMG-20221213095800580103364.jpg

Record: Process Description/Flow Diagram		**AOC:** No
Ref #: JB4-RR-002	**Reviewed By:** Jake Berger	**Reviewed Date:** 12/13/2022

Line Diagram: cooling water flow
Photo(s) 1. IMG-20221213095642564294117.jpg
Record: Process Description/Flow Diagram **AOC:** No
Ref #: JB4-RR-001 **Reviewed By:** Jake Berger **Reviewed Date:** 12/13/2022
Industrial process wastewater flows
Photo(s) 1. IMG-20221213095204524901 24.jpg

SECTION IV – SAMPLING ACTIVITIES AND ANALYTICAL RESULTS

No sampling was conducted.

SECTION V - AREAS OF CONCERN

Areas of Concern may not be in sequential order.

The presentation of areas of concern does not constitute a formal compliance determination or violation.

AOC Reference #: JB4-RR-005	**Records Review: Compliance Monitoring & Enforcement Report**
Regulation and/or Permit Requirement NPDES Permit OH0004006, OH0004006-V,A,2	
OH0004006-V,A,2 - Annual Report. You shall complete an annual report using the Annual Reporting Form provided by Ohio EPA at the following location: http://www.epa.ohio.gov/portals/35/permits/OHR000006/ARForm.docx You are not required to submit your annual report to Ohio EPA unless specifically requested. The timeframe to complete the report is at the discretion of the permittee but the same schedule to complete shall be maintained throughout this permit term. You shall keep the completed annual reports with your SWPPP.	
AOC: Eramet has not completed any Stormwater Annual Reports since the NPDES permit became effective in 2019.	

AOC Reference #: JB4-RR-007	**Records Review: Compliance Monitoring & Enforcement Report**
Regulation and/or Permit Requirement NPDES Permit: • OH0004006 OH0004006-IV,E,1,a • OH0004006 OH0004006-IV,E,1 • OH0004006 OH0004006-IV,K,3	

- OH0004006-IV,E,1 - Routine Facility Inspections
- OH0004006-IV,E,1,a - Conduct routine facility inspections of all areas of the facility where industrial materials or activities are exposed to storm water, and of all storm water control measures used to comply with Part IV. Items A-C conditions contained in this permit. Routine facility inspections shall be conducted at least quarterly (i.e., once each calendar quarter) although in many instances, more frequent inspection (e.g., monthly) may be appropriate for some types of equipment, processes, and control measures or areas of the facility with significant activities and materials exposed to storm water. Perform these inspections during periods when the facility is in operation. You shall specify the relevant inspection schedules in your SWPPP document as required in Part IV. Items A-C. These routine inspections shall be performed by qualified personnel (for definition see VI - Definitions) with at least one member of your storm water pollution prevention team participating. At least once each calendar year, the routine facility inspection shall be conducted during a period when a storm water discharge is occurring.
- OH0004006-IV,K,3 - Additional Inspection Requirements**.** (See also Part IV.E.) As part of conducting your quarterly routine facility inspections (Part IV.E.), address all potential sources of pollutants, including (if applicable) air pollution control equipment (e.g., baghouses, electrostatic precipitators, scrubbers, and cyclones), for any signs of degradation (e.g., leaks, corrosion, or improper operation) that could limit their efficiency and lead to excessive emissions. Consider monitoring air flow at inlets and outlets (or use equivalent measures) to check for leaks (e.g., particulate deposition) or blockage in ducts. Also inspect all process and material handling equipment (e.g., conveyors, cranes, and vehicles) for leaks, drips, or the potential loss of material; and material storage areas (e.g., piles, bins, or hoppers for storing coke, coal, scrap, or slag, as well as chemicals stored in tanks and drums) for signs of material losses due to wind or storm water runoff.

AOC:

Eramet has no records of completed Routine Facility Stormwater Inspections, required once per quarter, having ever been completed since the effective date of the NPDES permit in 2019.

SECTION VI – CLOSING CONFERENCE AND FOLLOW UP

Closing Conference

The EPA Region 5 Lead Inspector held a closing conference with Facility personnel at 02:05 PM (ET) on 12/13/2022 for the inspection. During the closing conference, EPA Region 5 Lead Inspector discussed the observations and Areas of Concern identified during the inspection. Observations and Areas of Concern have not yet been evaluated for a formal compliance determination.

EPA confirmed that no information or photos collected are Confidential Business Information.

Follow Up

No follow up was required after exiting the facility on 12/13/2022.

Communication Log

No additional information received by EPA Region 5 after exiting the Facility on 12/13/2022.

SECTION VII – LIST OF APPENDICES

1. Photo Log
2. Document Log

APPENDIX 1: PHOTO LOG

Photos taken using a Panasonic Toughbook CF-20

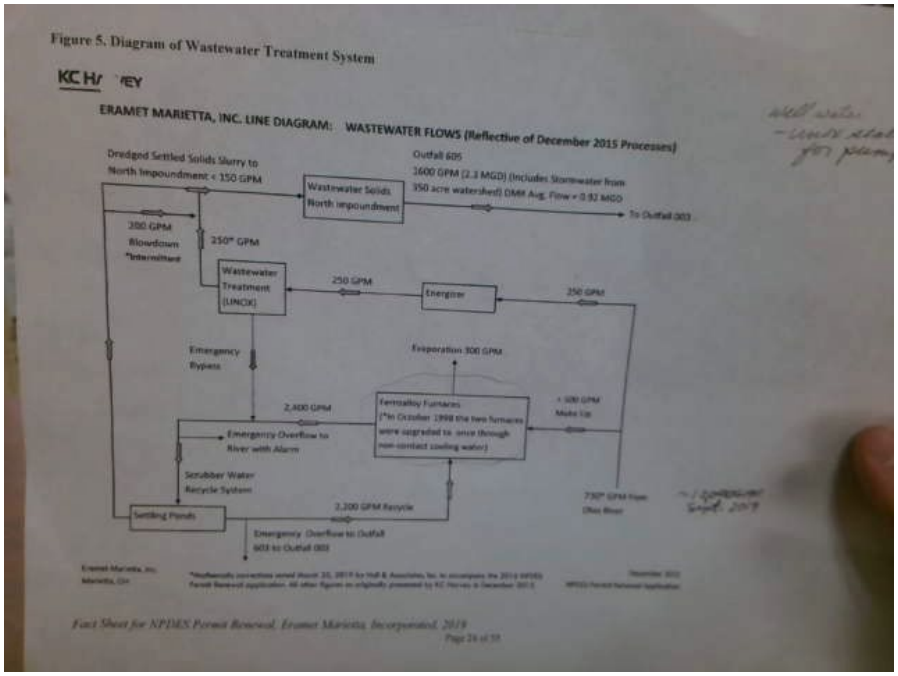

Diagram of Wastewater Flows	IMG-202212130952045249012 4.jpg	
12/13/2022 09:52 AM EST	Photographer: Jake Berger	
	No CBI	No PII

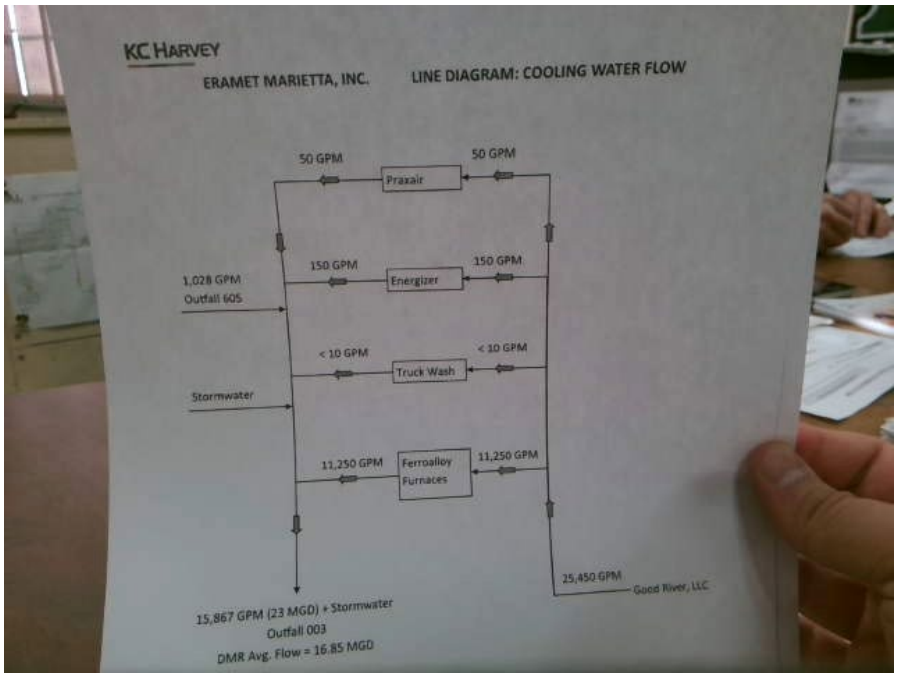

Diagram of Cooling Water Flow	IMG-202212130956425642941 17.jpg	
12/13/2022 09:56 AM EST	Photographer: Jake Berger	
	No CBI	No PII

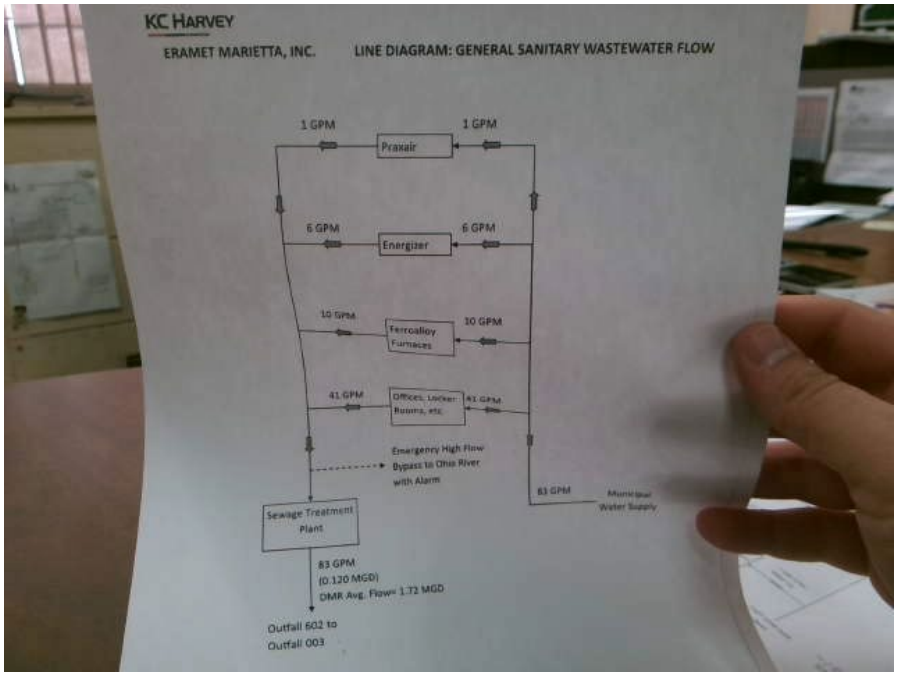

Diagram of General Sanitary Wastewater Flow	IMG-20221213095800580103364.jpg	
12/13/2022 09:58 AM EST	Photographer: Jake Berger	
	No CBI	No PII

Diesel refueling tank	IMG-20221213122729272959154 8.jpg	
12/13/2022 12:27 PM EST	Photographer: Jake Berger	
	No CBI	No PII

	IMG-20221213112414241420931 6.jpg	
12/13/2022 11:24 AM EST	Photographer: Jake Berger	
Outfall 003	No CBI	No PII

	IMG-20221213113214321419976 6.jpg	
12/13/2022 11:32 AM EST	Photographer: Jake Berger	
Outfall 602	No CBI	No PII

	IMG-20221213114353435328811 6.jpg	
12/13/2022 11:43 AM EST	Photographer: Jake Berger	
Outfall 603	No CBI	No PII

	IMG-20221213120353353677965.jpg	
12/13/2022 12:03 PM EST	Photographer: Jake Berger	
Outfall 605	No CBI	No PII

	IMG-20221213110656656208986.jpg	
12/13/2022 11:06 AM EST	Photographer: Jake Berger	
Settling Ponds	No CBI	No PII

	IMG-20221213115412541255971 9.jpg	
12/13/2022 11:54 AM EST	Photographer: Jake Berger	
UNOX wastewater treatment system	No CBI	No PII

	IMG-20221213121209129179269.jpg	
12/13/2022 12:12 PM EST	Photographer: Jake Berger	
Wastewater solids north impoundment	No CBI	No PII

APPENDIX 2: DOCUMENT LOG

Document Type	Document Name	Contains CBI	Contains PII	Uploaded By	Date Received
Permit	OH0004006_Eramet_Permit_20190901.pdf	No	No	Jake Berger	12/12/2022
Inspection Report – Previous	OH0004006_Eramet_OEPAinsp_20220311.pdf	No	No	Jake Berger	12/12/2022
Violation History	OH0004006_Eramet_NCnotif_Fecal_20220527.pdf	No	No	Jake Berger	12/12/2022
Violation History	OH0004006_Eramet_NCnotif_Mn_20220301.pdf	No	No	Jake Berger	12/12/2022
Violation History	OH0004006_Eramet_NCnotif_Mn_20220401.pdf	No	No	Jake Berger	12/12/2022
Violation History	OH0004006_Eramet_NCnotif_Zn_20221005.pdf	No	No	Jake Berger	12/12/2022
Communications	OH0004006_Eramet_NOVresp_20220331.pdf	No	No	Jake Berger	12/12/2022