

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

A576452270

FACILITY: Ventra Evert, LLC		SRN / ID: A5764
LOCATION: 601 W. Seventh Street, EVART		DISTRICT: Cadillac
CITY: EVART		COUNTY: OSCEOLA
CONTACT: Nick Spivey , EHS Manager		ACTIVITY DATE: 11/18/2019
STAFF: Caryn Owens	COMPLIANCE STATUS: Compliance	SOURCE CLASS: MAJOR
SUBJECT: Scheduled Inspection and Records Review (Records were updated December 10, 2019 in the inspection report, so that is the date I used for the FCE).		
RESOLVED COMPLAINTS:		

On Monday, November 18, 2019, Caryn Owens, Bob Byrnes, and Jeremy Howe of the Department of Environment, Great Lakes, and Energy (EGLE) – Air Quality Division (AQD) inspected Ventra Evert, L.L.C (Ventra) (SRN: A5764) located at 601 West Seventh Street in Evert, Osceola County, Michigan. The site is located on the south side of West Seventh Street and consists of one main building on the property. The field inspection and records review were to determine compliance with the Renewable Operating Permit (ROP) MI-ROP-A5764-2015c. The site is currently a major source for volatile organic compounds (VOCs) and hazardous air pollutants (HAPs), and the source is subject to the following Federal regulations: National Emission Standard for Hazardous Air Pollutants (NESHAPs): for Surface Coating of Plastic Parts and Products in 40 CFR, Part 63, Subpart PPPP; Commercial, and Institutional Boilers and Process Heaters in 40 CFR, Part 63, Subpart DDDDD; and for Stationary Reciprocating Internal Combustion Engines in 40 CFR, Part 63, Subpart ZZZZ. Additionally, a consent order is cited to the facility due to alleged failure to timely complete performance testing on the EUFASCIA-LINE, dated August 17, 2009, which has not been terminated as of the date of the field inspection. This ROP is currently in Renewal, and the consent order will be addressed during the Renewal.

Summary:

The activities covered during the field inspection and records review for the facility indicates the facility was in compliance with ROP MI-PTI-A5764-2015c. Specific permit conditions that were reviewed are discussed below.

On-site Inspection:

During the field inspection the weather Conditions were cloudy, about 37 degrees Fahrenheit, and calm winds about 5 to 10 miles per hour from the south. AQD met Mr. Spivey, for a facility inspection and records review. Mr. Spivey accompanied AQD through the facility to observe the permitted emission units and associated processes. Ventra is a thermoplastic olefin (TPO) coating facility that manufactures automotive parts including trim components, exterior fascia parts, and taillight assemblies. The facility has a fascia line that uses both automatic and manual spray booths where the parts are painted using robots, and hand painted when necessary. Prior to entering the spray booths, the parts are washed by a four-stage washing system, then blown off to dry, and painted, and dried again. The fascia line is controlled by a water curtain and regenerative thermal oxidizer (RTO), and the manual booths are controlled by fabric filters. The fascia system air is re-circulated through the line, where only a certain percentage goes to the RTO.

There were formerly manual spray booths called the North C line in the eastern portion of the building, but since the previous inspection, the North C line has been removed from the site, and new assembly lines are in this area. There was also a manual spray booth (EUDBOOTH-4698) and quality control lab manual spray booth area (asset No. AM3800 controlled by fabric filters.), but these are currently not operated at this time, and the Company is looking for an area to use the paint booths. AQD also observed the paint kitchen that contained NB and PPG Coatings for 29 systems of 110 gallons base coat, Ventra also has two adhesion promoter (AP) systems, four clear coat systems, one 2K clear coat system, eight pigable basecoat systems, and two pigable clearcoat systems. The pigable systems are set-up in 55 gallon drums and can be changed quickly (within a day), whereas the other systems are changed approximately every six months because they are more difficult to clean the lines.

During the inspection the combustion chamber of the RTO was 1425 degrees Fahrenheit, and the required minimum temperature is 1400 degrees Fahrenheit. The air flow of the RTO was 40,170 scfm, and a change in pressure of 0.56 inches water column. AQD also observed the curing ovens, where ovens 1 and 2 were at 437 degrees Fahrenheit, and the other five ovens ranged between 260 and 290 degrees Fahrenheit.

Ventra is claiming the following exemptions at the facility from air permitting:

- **EU-GAS-EQUIP**, which is approximately 67 natural gas fired heaters, each having a max heat rating of 0.2 MMBTU/hr that meets exemption R 336.1282(2)(b)(i)
- **EUINJECTIONMOLD**, which is approximately 30 injection mold machines for production and one quality control lab that meets exemption R 336.1286(2)(b).
- **EUFIREPUMP1** is an emergency diesel fuel-fired (compression ignition) reciprocating internal combustion engine (RICE) rated at 130 horsepower which meets exemption R 336.1285(2)(g). Federal applicable requirements are addressed in EUFIREPUMP1 below.
- **EUBOILER1** is a 1.45 MMBTU natural gas-fired boiler used to keep the fire suppression system water above the freezing point which meets exemption R 336.1282(2)(b)(i). Federal applicable requirements are addressed in EUBOILER1 below.
- **EUASSEMBLY** is assembly equipment that requires minor gluing (about 200 gallons of glue per year), which meets exemption R 336.1287(2)(c)(i).
- **EUFASCIA-LINE** coating of metal parts meets exemption R 336.1285(2)(c)(iii), where coating of metal parts is not the predominant activity (according to 40 CFR Part 63, Subpart PPPP), and does not result in a meaningful change in quality and nature of emissions.

Records Review:

Source-Wide Conditions: These Conditions apply to the entire stationary source, including all process equipment covered by other permits, grand-fathered equipment and exempt equipment.

I. Emission Limits:

The source wide emission limit for VOC is 225 tons per year, based on a 12-month rolling time period. Based on the records reviewed, the highest amount of VOC emissions reported for the facility is 30.2 tons per 12-month rolling time period. Based upon the records reviewed, the facility is within the permitted VOC emission limits.

II. Material Limits:

Material Limits are not applicable for Source-Wide Conditions.

III. Process/Operational Restrictions:

Process/Operational Restrictions are not applicable for Source-Wide Conditions.

IV. Design/Equipment Parameters:

Design/Equipment Parameters are not applicable for Source-Wide Conditions.

V. Testing/Sampling:

Testing/Sampling are not applicable for Source-Wide Conditions.

VI. Monitoring/Recordkeeping:

AQD observed the paint kitchen where each coating is stored. Each coating system had daily log sheets to track the amount of coating used on a daily basis. The daily log sheets are entered into a computer system which is then used to calculate daily emissions and VOC content and volume for each coating used. Safety Data Sheets (SDS) are stored in computer files at the facility. The facility calculates the VOC emissions in tons per month, and 12-month rolling time period and were reported to the EGLE-AQD, which is discussed in Emission Limits above.

AQD reviewed records of the daily hours of operation. The records were kept in satisfactory order.

VII. Reporting:

Reporting of semi-annual reports and annual compliance reports for ROP certification were submitted to the AQD in timely manner. During the reporting period the permittee reported all monitoring and associated recordkeeping requirements. The ROP Reporting Conditions were met and there were no deviations.

VIII. Stack/Vent Restrictions:

Stack/Vent Restrictions are not applicable for Source-Wide Conditions.

IX. Other Requirements:

The facility is subject to a Consent Order, which has not been terminated as of the date of the field

inspection.

EUFASCIA-LINE: This line applies adhesion promoter, base coat, and clear coat to fascia. There are automatic (robot) and manual booths for each coating type. The automatic booths are vented through a water curtain, and a RTO, and the manual booths use dry fabric filters for particulate control.

I. Emission Limits:

The emission limits are 168.3 pounds per hour and 135 tons per 12-month rolling time period. Based on the VOC Emission reports, the VOC concentrations from October 1, 2018 through September 31, 2019 the highest VOC emissions reported were 30.2 tons per year based on a 12-month rolling time period. Additionally, the emissions reported from October 1, 2018 through September 31, 2019 ranged between 5.2 and 15.8 pounds per hour for EUFASCIA-LINE. Based upon the records reviewed, the facility is within the permitted VOC emission limits.

II. Material Limits:

The permitted material limits are as follows: 1.0 pounds per VOC of coating for AP, 0.7 pounds per VOC of coating for basecoat, and 0.7 pounds per VOC of coating for clearcoat. These material limits are all minus water as applied, after controls, based on a daily average. Based on the records reviewed, the actual AP VOC content ranged from 0.41 to 0.43 pounds of VOC per gallon minus water, after controls. The actual basecoat was at 0.33 pounds of VOC per gallon minus water, after controls, and the clearcoat ranged from 0.27 to 0.28 pounds of VOC per gallon minus water, after controls. The records reviewed indicated Ventra is in compliance with the material limits.

III. Process/Operational Restrictions:

The RTO shall not operate unless there is a minimum of 1,400 degrees Fahrenheit. During the inspection, the RTO was operating at a temperature of 1,425 degrees Fahrenheit. Additionally, according to the CAM plan for Ventra, EUFASCIA-LINE cannot operate until the RTO is at least 1,400 degrees Fahrenheit, if the temperature drops below 1,400 degrees Fahrenheit, EUFASCIA-LINE completely shuts down.

The minimum overall VOC control efficiency (combined capture and destruction) is not to be less than 86 percent across EUFASCIA-LINE. Based on the most recent capture and destruction efficiency performance test, completed October 13 and 14, 2015, for the RTO, the overall combined control efficiency was 93 percent.

During the field inspection of Ventra, the automatic booth water wash, dry fabric filters and RTO appeared to be operating properly.

The most recent Malfunction Abatement Plan (MAP) on file at AQD is from the most recent Renewal Application, received by AQD on October 15, 2019. The MAP is to address the RTO, a preventative maintenance plan of the RTO, Performance monitoring variables, corrective action in the event of equipment failure, and fugitive air emissions minimization procedures. The performance monitoring variables indicates that normal operating range of the RTO is between 1,400 to 1,600 degrees Fahrenheit, and the inlet static pressure of the RTO is between 0.47 inches to 0.72 inches water column.

IV. Design/Equipment Parameters:

According to Mr. Spivey, Ventra operates electrostatic guns for the automatic and manual booths for the application of basecoats and clearcoats. The spray guns are considered High Volume Low Pressure (HVLP) guns.

The appropriate range of the RTO to define proper operation shall be between 1,400 and 1,600 degrees Fahrenheit. As previously stated, during the field inspection, the RTO was at 1,425 degrees Fahrenheit.

Based on observations during the field inspection, a device to continuously monitor and record the inlet static duct pressure of the RTO has been installed.

V. Testing/Sampling:

The five most frequently used coatings and five coatings at random are tested annually for VOC content, as applied, minus water. The last analysis was completed in November 18, 2018, and the test results were submitted and reviewed by the AQD. Test results of the 2018 VOC Coating Test indicated compliance with limits contained in the ROP.

October 2015 was the last capture and destruction efficiency testing that was completed for the facility. Based on the testing data, the RTO capture efficiency was 94.85 percent and the destruction efficiency was 97.90 percent.

Additionally, the performance testing completed, correlated the VOC emission rate in pounds per hour with the inlet static duct pressure. Based on the field inspection, the inlet static duct pressure 0.56 inches water column, which was similar to the inlet static duct pressure during performance testing.

VI. Monitoring/Recordkeeping:

SDS are stored in the computer system at the facility. AQD requested SDS sheets for the most used coatings, adhesion promotor, and base coat. AQD observed the paint kitchen where each coating is stored. As previously stated, each coating system had daily log sheets to track the amount of coating used on a daily basis. The daily log sheets are entered into a computer system which is then used to calculate daily emissions and VOC content and volume for each coating used.

AQD reviewed records of Ventra's cleanup and purge solvents (used and reclaimed) in EUFASCIA-LINE, and monthly records for the daily hours of operation. The records were kept in satisfactory order.

AQD reviewed records of the RTO temperatures and inlet static pressures. During the weekends the RTO is not completely shut down during non-production periods, so the start-up of the fascia line wouldn't be delayed trying to have the RTO reach appropriate temperatures. The low temperatures and inlet static pressures were observed in the records during non-production time.

The facility calculates and records VOC emission rates in pounds per hour, tons per month, and tons per 12-month rolling time period, which are discussed above under Emission Limits.

Additionally, the facility submits CAM semi-annual and annual reports that informs AQD of malfunctions that occurred at the facility.

During the field inspection and records review, it appears the facility properly maintains the RTO, and properly monitors and records the monitoring data. Corrective actions are taken as soon as a malfunction has occurred.

VII. Reporting:

Reporting of any deviations, quarterly reports, semi-annual reports, and annual compliance reports for ROP certification were submitted to the AQD in timely manner.

Based on the most recent semi-annual report from between January 1, 2019 through June 30, 2019), the facility reported no deviations.

The facility submitted quarterly reports that demonstrated compliance with VOC emission limits and material limits. Additionally, the facility submitted the proper testing protocol and reports to the AQD within a timely manner.

During the reporting period the facility reported all monitoring and associated recordkeeping requirements of the ROP. There was no monitor downtime reported for EUFASCIA-LINE, and two CAM excursions reported. AQD addressed the CAM excursions in the semi-annual review.

VIII. Stack/Vent Restrictions:

The stack heights for EUFASCIA-LINE were in compliance with the ROP diameters and heights.

IX. Other Requirements:

The equipment at the facility appeared to be well maintained. The purge solvents and coatings were captured and stored in closed 55-gallon containers. Waste materials are shipped off-site.

EUFIREFPUMP1: An emergency diesel fuel-fired (compression ignition) reciprocating internal combustion engine (RICE) rated at 130 horsepower located at a major source of HAP emissions, used to power the building emergency fire suppression water pump. According to Mr. Spivey, a new emergency engine was installed July 18, 2018.

I. Emission Limits:

Emission Limits are not applicable with EUFIREPUMP1.

II. Material Limits:

Material Limits are not applicable for EUFIREPUMP1.

III. Process/Operational Restrictions:

EUFIREPUMP1 has not been used for any emergencies within the past year. EUFIREPUMP was replaced on July 18, 2017. EUFIREPUMP1 is operated two times per month for 1 hour. The maintenance records appeared to be complete. The facility chooses to change the oil on an annual basis, and the last oil change was March 20, 2018. According to Mr. Spivey, the oil change and filter check is supposed to be changed on an annual basis and set-up up in a computerized preventative maintenance system. The system had an issue around the time of the oil and filter change was supposed to be completed, so Mr. Spivey had the oil change completed on the engine on December 10, 2019 when he realized the system had missed the previous oil change date. The maintenance records are attached to this report.

IV. Design/Equipment Parameters:

EUFIREPUMP1 is equipped with a non-resettable hour meter and is recorded on the weekly maintenance checks. During the inspection, the fire pump engine hour meter had 46 hours run time recorded.

V. Testing/Sampling:

Testing/Sampling is not applicable for EUFIREPUMP1.

VI. Monitoring/Recordkeeping:

The facility is not required to submit notifications for EUFIREPUMP1, since it is an emergency engine with no applicable emission limits.

There have been no malfunctions of EUFIREPUMP1.

The facility inspects the EUFIREPUMP1 on a regular basis in accordance with manufacturer's recommendations.

The facility chooses to change the oil on EUFIREPUMP1 on an annual basis. A oil analysis has not been performed.

VII. Reporting:

Semi-annual reports and annual compliance reports for ROP certification were submitted to the AQD in timely manner. No deviations for EUFIREPUMP1 were reported.

VIII. Stack/Vent Restrictions:

Stack/Vent Restrictions are not applicable for EUFIREPUMP1.

IX. Other Requirements:

The facility appears to comply with 40 CFR Part 63, Subpart ZZZZ requirements for EUFIREPUMP1.

EUBOILER1: A 1.45 MMBTU natural gas-fired boiler used to keep the fire suppression system water above the freezing point. According to Mr. Spivey, the boiler was replaced May 15, 2018

I. Emission Limits:

Emission Limits are not applicable with EUBOILER1.

II. Material Limits:

Material Limits are not applicable for EUBOILER1.

III. Process/Operational Restrictions:

The facility completed a tune-up and energy assessment of EUBOILER1 on November 17, 2018.

IV. Design/Equipment Parameters:

Design/Equipment Parameters are not applicable for EUBOILER1.

V. Testing/Sampling:

Testing/Sampling is not applicable for EUBOILER1.

VI. Monitoring/Recordkeeping:

Monitoring/Recordkeeping is not applicable for EUBOILER1.

VII. Reporting:

Semi-annual reports and annual compliance reports for ROP certification were submitted to the AQD in timely manner. No deviations for EUBOILER1 were reported.

VIII. Stack/Vent Restrictions:

Stack/Vent Restrictions are not applicable for EUBOILER1.

IX. Other Requirements:

The facility appears to comply with 40 CFR Part 63, Subpart DDDDD requirements for EUBOILER1.

EUDBOOTH-4698: This is a single dry filter spray booth and Area D drying oven controlled by dry fabric filters.

I. Emission Limits:

The emission limits are 0.65 tons per day of VOCs. Based on the fourth quarter VOC Emission report, this booth has not been operational. It is still at the facility, but Ventra is deciding on how to best utilize this booth.

II. Material Limits:

The permitted material limits are as follows for Ventra: 6.3 pounds VOC per gallon of coating minus water as applied. As previously stated, this booth is has not been operated since July 2018.

III. Process/Operational Restrictions:

EUDBOOTH-4698 contains dry fabric filters.

IV. Design/Equipment Parameters:

Design/Equipment Parameters are not applicable for EUDBOOTH-4698.

V. Testing/Sampling:

The five most frequently used coatings and five coatings at random are tested annually for VOC content, as applied, minus water. The last analysis was completed in November 18, 2018, and the test results were submitted and reviewed by the AQD. Test results of the 2018 VOC Coating Testing indicated compliance with limits contained in the ROP.

VI. Monitoring/Recordkeeping:

SDS are stored in the computer system at the facility. Ventra used daily log sheets to track the amount of coating used on a daily basis when in operation. The daily log sheets are entered into a computer system which is then used to calculate daily emissions and VOC content and volume for each coating used.

The facility calculates and records VOC emission rates in tons per day which are discussed above under Emission Limits.

VII. Reporting:

Reporting of any deviations, quarterly reports, semi-annual reports, and annual compliance reports for ROP certification were submitted to the EGLE in timely manner.

Based on the most recent semi-annual report from between January 1, 2019 through June 30, 2019), the facility reported no deviations.

The facility submitted quarterly reports that demonstrated compliance with VOC emission limits and material limits.

VIII. Stack/Vent Restrictions:

The stack heights for EUDBOOTH-4698 were in compliance with the ROP heights restrictions.

IX. Other Requirements:

Other Requirements are not applicable for EUDBOOTH-4698.

FGMACT-PPPP: Requirements of the surface coating of plastic parts and products as required by 40 CFR, Part 63, Subpart PPPP. FGMACT-PPPP is applicable for emission units EUFASCIA-LINE and EUDBOOTH-

4698. The pollution control equipment (the RTO) for FGMACT-PPPP is only applicable when the company chooses to use the "emission rate with add-on control" option; however, based on the most recent performance testing completed in October 2015, the facility did not meet the requirements to use the "emission rate with add-on control" option. Currently Ventra uses the "emission rate without add-on control" option for emission units EUFASCIA-LINE and EUDBOOTH-4698.

I. Emission Limits:

As stated above, Ventra uses the "emission rate without add-on control" compliance option due to low HAP content of coatings used at the facility. The emission limit for organic HAPs for each existing thermoplastic olefin (TPO) coating affected source is 0.26 pounds HAP per 12-month rolling time period of coating solids. Based on the most recent summary of HAP emissions from the coating operations from September 6, 2019, the facility is between 0.15 and 0.16 pounds HAP per 12-month rolling time period of coating solids. Based on the records reviewed, the facility is within the permitted HAP emission limit without using control.

II. Material Limits:

The facility is not using the "Compliant material option" option, and therefore material limits do not apply.

III. Process/Operational Restrictions:

The facility is **not** currently using the "emission rate with add-on controls" option; therefore, the process and/or operational restrictions do not apply.

IV. Design/Equipment Parameters:

The facility continuously monitors the temperature of the RTO, the inlet static pressure, and air flow, and they appeared to be installed correctly.

V. Testing/Sampling:

In October 2015, performance testing was conducted at the facility. Due to the construction of EU-FASCIA-LINE, the facility is not capable of showing compliance as a permanent total enclosure (PTE), so the facility attempted to show compliance with FGMACT-PPPP using a temporary total enclosure (TTE). During the performance testing the facility was **not** able to meet the following ways to show capture in the system of EUFASCIA-LINE Liquid-to-uncaptured-gas protocol using a temporary enclosure or building enclosure or a gas-to-gas protocol using a temporary total enclosure or building enclosure. Therefore, the facility is **not** able to use "emission rate with add-on control" option to show compliance with FGMACT-PPPP.

VI. Monitoring/Recordkeeping:

Certificates of Analysis provided by the manufacturer were used to determine the mass fraction of organic HAP and density of each coating, thinner, and other additives. These records were available upon request and are used to calculate the organic HAP emissions from the facility. The emission calculation records documenting compliance with the organic HAP emission limit were submitted in the semi-annual certification of compliance for NESHAP PPPP. The report was previously reviewed and documented Ventra was within the HAP emission limits.

VII. Reporting:

Reporting of semi-annual reports, and annual compliance reports for ROP certification were submitted to the AQD in timely manner. During the reporting period, the permittee reported all monitoring and associated recordkeeping requirements of the ROP, and there were no deviations.

VIII. Stack/Vent Restrictions:

Stack/Vent Restrictions are not applicable with FGMACT-PPPP.

IX. Other Requirements:

The facility is currently showing compliance with FGMACT-PPPP using the emission rate without add-on control.

FGCOLDCLEANERS: The facilities parts cleaner appeared to be well maintained. According to Mr. Spivey, the parts are dried appropriately, and the solvent is not agitated or heated to clean the parts. AQD observed the lid closed and proper instructions on the parts cleaner. FGCOLDCLEANERS was in compliance with the ROP.

FGRULE290: There are currently no Rule 290 emission units located at the facility; therefore, this flexible group is not applicable at this time.

FGRULE287(c): Currently, the only emission units the facility is using in this flexible group is the Quality Control (QC) lab manual spray booth (Asset # AM3800) and the assembly equipment that requires minor adhesive activities located in the area near the former Area C manual spray coating. The QC booth is currently not in use at the facility. Coating usage is limited to 200 gallons per month, minus water, as applied. According to Mr. Spivey, the spray booth is not in use and the facility uses approximately 200 gallons of glue per year for the assembly process.

NAME Camm Owens

DATE 12/10/19

SUPERVISOR SN